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ARMY CONTRACTS LET

Contracts for supplying meats to the posts of the department of the Missouri, United States Army, were let last week at Omaha to Armour & Company, Swift & Company and the Cudahy Packing Co.

NO DUTY ON TANKAGE.

In a recent case involving the importation of tankage of slaughter houses from Canada, the Assistant Secretary of the Treasury decided that, as such matter was used only for fertilizing purposes, it should be admitted free of duty.

WORK ON MORRIS PLANT

Favorable progress is being made on the new Kansas City packing plant of Morris & Co., and General Manager T. E. Wilson, who went over from Chicago last week to inspect the work, reports that they will be able to commence killing in July.

EXPERIMENTS IN BEEF MAKING.

The Senate committee on agriculture is now considering the bill of Senator Teller, of Colorado, appropriating \$250,000 to conduct experiments in non-corn growing states in the breeding and feeding of live stock for market, and in growing crops and forage plants adapted to these purposes. Secretary Wilson and a number of experts from the Western territory to be benefited, appeared in favor of the bill, which stands a good chance for passage, though with a greatly reduced appropriation.

ANOTHER ATTACK ON SWIFT.

Rivals of the Swift interests in New England who attempted to keep them out of the John P. Squire Company, of which they lately secured control, have returned to the attack after having been thrown out of court. The bill of equity filed against the protective committee which had been conducting the Squire affairs since the reorganization was dismissed by the Massachusetts courts as groundless. It had been filed in support of an application for an injunction to prevent the election of Swift directors, and of E. C. Swift as president. Now the objectors have come in with a new equity bill, in which E. C. Swift and Harry L. Burrage, formerly manager under the reorganization, have been made party defendants, along with the protective committee.

MEATS FOR THE ARMIES.

The flurry in the provision market following the outbreak of hostilities between Russia and Japan had ample provocation in the news coming in from packinghouse centres. Previous to the actual beginning of war, before it was certain there would be a conflict between the armies and navies of the two nations, the demands upon American producers were already enormous. It is estimated that up to last week Russian shipments of mess beef from Chicago, Omaha and Kansas City had aggregated more than six million pounds, while Japan had ordered seven million pounds of mess and corned beef. There is a prevalent belief that the Japanese soldiers live on cereals. These orders do not look like it.

Evidently foreign agents had further instructions conditional upon the beginning of actual fighting, for on Tuesday, the day after the trouble began, Russian agents visited the Omaha packers and asked for "rush" bids for 5,000,000 pounds of dressed meats. The specifications called for immediate delivery at San Francisco, and it was evident that the Russian government needs this meat supply, and will try to get it across to Vladivostock in spite of the Japanese navy. Other supplementary orders have come to the other packinghouse centres, and the amount of meat and provisions already contracted for will be greatly increased.

United States Consul General Fowler, at Che Foo, China, does not believe the war will benefit the United States commercially. In an interview at San Francisco on Tuesday he said: "The war, of course, will put a stop, in great measure, if not altogether, to Russian and Japanese purchases in and shipments of supplies from this country. Aside from that loss of trade, the United States will lose at least \$20,000,000 of business with North China during the first twelve months of the war. This country does a large business via the ports of Che Foo and Niu-Chwang, in North China, and much of that business is sent on to Manchuria and beyond.

"Active hostilities in that part of the world will, of course, greatly curtail American trade for an indefinite period. Other countries will be similarly affected."

NEW SHEEP PENS AT BUFFALO.

Plans have been approved for new sheep pens at the East Buffalo Stock Yards to replace those recently burned. The estimated cost is \$150,000 and provision will be made for 35,000 head of sheep.

ATLANTA COTTON OIL EXCHANGE

It has been decided to establish a cotton oil exchange at Atlanta, Ga. L. A. Ransome, district manager for the Southern Cotton Oil Co., called a meeting of twenty cotton oil mill men in that city last week and the organization was decided upon. The exchange will occupy quarters in conjunction with the chamber of commerce.

EIRICK AS A PROPHET.

L. M. Eirick, the official prophet of the big East Buffalo livestock commission firm of Eirick Bros., hit it again last week on hog prices, having predicted the rise which took place, with profitable results to those of his customers who took advantage of his tip.

STOCKYARDS BILL DEFEATED.

The bill introduced in the Kentucky Legislature to regulate the charges of stockyards' companies for pennage, watering and feeding stock was defeated by an overwhelming vote last week. It was claimed that the bill was in the interests of the farmers and stock raisers. "If the farmers would treat each other honestly, instead of railing at corporations, they would get along better," was the meaty reply of one member to the argument.

WILL TRY PUBLICITY CURE.

The Kansas City Livestock Exchange has decided to adopt a new plan to force the railroads to improve the service they have been giving shippers to that market, which has been so bad as to threaten the very existence of the market. Records kept of delays in receipt of shipments and other failings of the railroad companies, will be published daily, with the details of the delays and the roads and officials responsible. It is hoped in this way to force the transportation people to mend their ways.

JOINS THE SWIFT FORCES.

Through banking circles the announcement comes that Charles R. Hannan, until recently president of the First National Bank of Council Bluffs, Ia., has become identified with Swift & Company, and will have charge of the financial affairs of this big concern in New England. The interests of the Swift house have become so extensive in the New England territory that special organization is needed, and it is understood the services of a financial expert of Mr. Hannan's qualifications will be particularly useful.

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WADE'S SELF-INTEREST MEAT BILL

Representative M. J. Wade, of Iowa, has been talking in Washington, D. C., about the so-called "beef trust." Judge Wade says that the butchers are being driven out of business. In the same breath he states that the big fellows are "soaking the public for their meats, while paying the stockmen very little for their livestock." The only way to drive butchers out of business is by selling the public meat cheaper than the butchers can sell it. In such an event the eater has a peculiar "soak"

But that is about the average logic of the average Congressman who attains office by clap-trap methods and keeps it by the same device. Such a display of intelligence also explains the indifferent laws which the Supreme Court is so often called upon to upset.

It might be interesting to this Iowa Congressman to know that there are more butcher shops now than there were two years ago, and nearly 50 per cent. more of them than there were fifteen years ago. They are as large as their predecessors, and must be doing as well or better, else they would not multiply so fast. New York City is a storm center for this competitive meat trade. There are now 6,000 butcher shops there, as against 5,000 shops about three years ago, and new ones are constantly opening. Judge Wade ought to know that the minority seldom controls anything, whether in politics or trade. The alleged "beef trust" only kills 4,000,000 head of the 11,000,000 cattle slaughtered in this country annually. The farmers, independent butchers and unofficial abattoirs alone kill half of the beef the country eats.

Representative Wade's statement that Iowa produces more livestock than any other State in the Union is true from a numerical point of view. Iowa has 9,500,000 hogs, 5,400,000 cattle and 1,100,000 sheep, or 16,000,000 head in all. These stock are worth about \$215,000,000. Texas has 10,000,000 cattle, 2,800,000 hogs and 2,000,000 sheep, or 14,800,000 head all told. These are worth on the same basis \$322,000,000, or about \$107,000,000 more than the Iowa crop of four-legged animals.

This Congressman has introduced a bill which provides as follows: "It shall be unlawful to transport cattle, hogs and other animals from one State into another with the purpose or intention of selling the same, or the products thereof, at such prices as

to drive competitors in any community out of business, or with the purpose of selling the goods to one dealer to the exclusion of the others in order to destroy competition." The penalties of this bill are cash forfeits ranging from \$1,000 to \$5,000 per offense, and deprivation of the use of the mails.

The animus of this peculiarly anarchistic measure may be better understood when it becomes known that the honorable gentleman introducing it is allied with a movement back of which is the Corn Belt Producers' Association of Iowa. The ostensible head of this crowd is Fred Larrabee, a son of former Governor Larrabee. S. F. Spangler, one of Iowa's wealthiest stock raisers, is also in it. It is also allied with the plans of the Independent Packing Company, the new manufacturing end of the National Livestock Association. What the people should feel a deep interest in is the effrontery of Congressman who introduces and has passed laws in the operation of which he has direct financial interest, a Congressman who uses the national legislature as an advertising plant for his own and his friends' financial schemes.

Iowa has an especial weakness in this line. It seems to be the "Iowa idea" to use Congress for private business purposes, and such enterprises not only utilize the mails for their burglarious schemes, but do so under the franking privileges of Congress. The oleomargarine bill was one of the breed.

Congressman Wade evidently knows nothing about the sole agency practice in trade. Even in Iowa the fence man, the gate crank, the wire patent man and others sell "country rights" and make sole agents. The packer has an equal right with any one else to appoint a consignment agent, who pays for the privilege of handling his products exclusively.

The moonshine foolishness of this bill of Wade's is shown even in the penalties imposed. Taking away the privilege of use of the mails in such a case smacks of the "boiling oil and melted lead" punishments of comic opera. It would be funny were it not for the apparent animus behind it.

Speaking of so-called "trusts," what has this Iowa lawmaker to say on the subject of the Iowa "butter trust?" It is a notorious fact that all the butter of Iowa is sold at a pre-arranged price. Would Mr. Wade favor

a law prohibiting interstate commerce in Iowa butter, because it is marketed in combination, and is therefore presumably injurious to independent competition?

SPRINGER MAY DECLINE.

Ex-President John W. Springer, of the National Livestock Association, who was elected to the presidency of the Independent Packing Company by the association at its Portland, Ore., convention, has not yet accepted the position. Mr. Springer may not accept this new responsibility. He has a load of work upon his shoulders. The health of Mrs. Springer has been so bad lately that her husband is desirous of getting out of a lot of those things which take him from home so much.

For this reason alone and to get some measure of needed rest for himself, Mr. Springer contemplates getting out of a lot of enterprises which have hitherto claimed so much of his time and attention. He is aware that the establishing and building of a lot of new packing plants is no small undertaking. The locations must be found, the contracts for buildings must be proposed and gone into, transportation and proper distributing service must be provided for, and then the actual work of getting structures up and plans put in motion must be gone into. There are a hundred and one big and little things to be done in a scheme of this kind that need not worry the promoters of small plants. At every stage of the game it is work and worry. Mr. Springer is a worker and a builder, but he wishes to live also, and does not care to wear out his life in establishing this huge dead-meat end of the livestock industry if he can see his way around it.

The difficulty in the way is to get a man who can take his place. He has not yet declined the place of president of the new packing concern, but he is seriously considering the advisability of doing so. If he consulted his own feelings he would decline at once.

DEATH OF A BEEF PIONEER.

Benjamin F. Bailey, who founded one of the big Western Massachusetts beef concerns, now the Northampton Beef Company, died last week at Northampton, Mass., at the age of 76. Mr. Bailey was the father-in-law of

WILL THE CATTLE GROWERS SECEDE?

The Executive Committee of the American Cattle Growers' Association has issued a call for a national convention of cattlemen at Denver on March 16 and 17.

This call is said to be the result of dissatisfaction on the part of cattle raisers with the tendencies developed in the National Livestock Association. At the late gathering at Portland the meagerness of the attendance, especially of cattlemen, was the subject of comment. At that time reports were current that the cattle raisers were not pleased with the predominance of the sheep interests in the National Livestock Association, and considered that their own interests were not being properly cared for. It was said also that they did not give their approval to the independent packinghouse plan and other schemes which occupied so much of the attention of the convention, and that there was a strong movement for a separate organization of cattlemen, which should devote itself exclusively to the pressing questions now facing cattle raisers. The revival of the dormant American Cattle Growers' Association was predicted, and the call for the convention at Denver in March is said to be the

The convention will be immediately preceded by the annual gathering of the Colorado Cattle and Horse Growers' Association, an energetic and thriving body, and it is announced that the two meetings will bring together hundreds of cattle growers from all over the country-North, West and South. The abuses in railroad transportation will be the chief topic of discussion. The Colorado association members are already agitating the plan of a railroad commission in that State to take up this and other transportation questions. Cattle Growers' Association gathering is signed by F. C. Lusk, Chico, Cal., president, and H. W. Robinson, Denver, Colo., secretary.

Secretary C. F. Martin, of the National Livestock Association, takes cognizance of this movement to promote a separate cattle growers' body in a bulletin which he has just issued on the results of the Portland convention. His pleading is significant. He says:

"There has been some recent discussion as to the advisability of organizing separate national associations of cattle growers and sheep growers. It seems to us at this time this is uncalled for, as the relations existing between the two branches of the industry are anily growing closer and closer, their interests with one or two minor exceptions being

"Every one who is familiar with legislative matters knows that it is only through united efforts that results can be accomplished. With a division of these forces, nothing will be gained at Washington or at State lawmaking centers. If each one would lend his assistance, whether great or small, towards the success of the National Livestock Association, which has now become an established and recognized power at Washington, instead of constantly bickering and endeavoring to create dissatisfaction over small matters, the results which the stockmen of this country would receive would be of untold value."

The call for the American

HOPE SPRINGS ETERNAL.

The number of Western cities, large and small, which are falling victims to the "independent packing plant" fever is constantly growing. The backers of the real, official, hall-marked Independent Packing Company have had their eyes on several Western locations which promised to be suitable for their purposes, but it would appear that individual schemers of more or less standing have used the independent movement as an excuse to further plans of their own. Western advices indicate that almost every small city which has railroad connections with the cattle-raising country is in the throes of the independent packinghouse agitation. All of them believe they are the "official locations" of the Independent company, and all receive the promoters with open arms, whether they show credentials or not.

The latest method which the promoters find useful is to circulate the report that the Independent company has made an alliance with the big Western railroads, by which it is to establish a chain of packinghouses all over the West and receive the backing and support and special favor of the railroad companies. Even such minor centers as Sedalia, Mo., have been fed with this promising story. The promoter who appeared there announced that a deal had been made with the Missouri Pacific for stock yards, and that work would commence at once. It is not believed that even the enterprising Independent Company boomers will acknowledge some of these free lance "bonus-seekers" as having credentials from them.

KANSAS CITY SHIPPERS REVOLT

All the interests surrounding the Kansas City stock yards are up in arms over the particularly atrocious shipping facilities afforded that centre by the railroads, and have appealed to Secretary Cortelyou of the department of Commerce and Labor, on the ground that he can compel the roads to afford some relief. Other Western centres have the same complaint, but Kansas City seems to be in an especially bad way. It is asserted that the majority of the commission houses are operating at a loss, business at the yards having fallen off alarmingly, because of railroad delays and discriminations.

The Kansas City live stock exchange wants a government commission to look into western livestock conditions. Many members of the exchange believe that the railroads are no more favorably inclined to live stock shippers now than they were last summer, when it was impossible to get cattle to market on time or in salable condition. One member said that the indifference of the roads will amount to a death blow to the commission business unless something is done to remedy matters before spring. According to his statement cattle and hogs are handled as if they were so much dead freight.

"I apprehend," he said, "that the difficulty lies in the fact that subordinate officials labor to make large showings for their respective territories, divisions and shipping points. They find that they can do this best by enforcing the tonnage rule, that is by mixing consignments so as to get the full benefit of the equipment capacity. consequence of such an endeavor is that a few cars of live stock are often held hours in order to make up a long train, and when once on the way the cattle or hogs are given no more attention than the balance of the freight.

"A few years ago the average time of transporting live stock from far Western and Southern points was twenty miles an hour. Now the best time made is ten miles an hour. Formerly the rule of early arrivals was uniformly observed by the railroads. It is not infrequent now to have live stock consignments held over hours beyond the market time."

It is estimated that the Kansas City market was cheated out of a thousand carloads of cattle last year solely by the dilatory practices of the railroads; while the loss in dollars and cents has fallen even more heavily upon the stock raiser. Commission men have found that the shrinkage in earnings is not due to natural conditions. They claim that it has been brought about by the oppression of railroads. After making due allowance for calamity howling, after deducting from consideration all conditions that discourage the live stock industry, the truth that the business of the live stock exchange is not what it used to be can be arrived at on the transportation score alone.

PRODUCERS TO CORNER EVERYTHING.

The co-operation fad is spreading. Encouraged by the success of farmers grain-marketing and elevator companies in some Western localities, and possibly stimulated by the reports of formation of co-operative packing plants, the announcement is now made of the creation of the National Farmers' Exchange. This formidable movement is announced to have a capital stock of no less than \$50,000,-000, and is said to be backed by all the cooperative agricultural interests of the Mississippi Valley. Its published aims cover a very wide field. The call states:

"We recommend that we concentrate our efforts, first, on grain; second, on livestock; third, on cold storage; fourth, on lumber and coal; fifth, beef and pork packing and milling.

"We recommend that branch offices be established and elevators and warehouses be built or bought all through the grain belt, from Oklahoma to North Dakota and from California east to the Allegheny Mountains, and we have arranged a plan of organization to reach every school district in the territory designated and will put organizers trained in this especial work in the field."

MEXICAN PACKING ENTERPRISE.

It has been reported that the Swifts are largely interested in the company formed to erect a packing and cold storage plant and build stockyards in the City of Mexico at an estimated cost of half a million dollars. The Mexican Government is said to have given this enterprise its sanction and support.

BOTH BILLS SHOVLD BE DEFEATED

It is evident to all honest investigators and observers that the cause of pure food has never had more active and earnest supporters and friends than the men who slaughter the live and sell the perishable meat. The public should need no reassurance at this time that the meat industry does not view with entire complacency a policy of obstruction and destruction to the larger welfare of the masses. The vital interest of the meat consumer becomes at once the vital interest of the meat producer. This is fundamental, a basic principle, and in stating it, it is stripped of all confusing verbiage:

The interests of the meat eater are the interests of the meat producer.

The meat trades of the United States are just now confronted with both a theory and a condition. The situation might be stated succinctly in a phrase greatly in use by orthodox preachers: "What must we do to be saved?" We despair of elevating the discussion of the pure food question to the higher plane as long as honest investigation is stifled and the surface of the vast, open sea of knowledge is only skimmed.

There are some who take the ground that there is no antiseptic more harmful than common salt, and that unless salt is placed on the forbidden list and forever tabooed, then the reform is merely a farce. There are eminent authorities, however, who argue that salt is the greatest preservative known to man, that it is essential to life, and that infusions of saline solutions into an impoverished and depleted circulatory system is the most effective last resort. The use of salt is universal. Even the domesticated beasts of the field crave it.

When theories conflict, when facts clash, where is the remedy? Experience and not speculation must decide. In the realm of practical affairs the imminent law of supply and demand controls. All other laws, wise or otherwise, go by the board.

A Backward Step.

Just at the present juncture in the development of man the question of food embodies an economic proposition far beyond the compass generally allotted to a discussion in the ordinary routine of living. Opening the field of controversy to all who should be heard on this momentous concern would throw most other topics into the background. In the light of the latest verdict of science it is difficult to account for the backward step which governments and municipalities have taken in restricting the use of antiseptic food-preservatives.

On the question of foods public opinion is an unknown quantity. It would be a herculean task to arrive at a reliable consensus of opinion. Even the referendum might fail to supply us with the desired information. And yet few questions have arisen which are of more vital import to this generation than the food question. But the public is largely indifferent in contributing to its settlement.

The ponderous masses are not easily aroused in matters intellectual; their interest in topics remote from the work-a-day field is stunted, but public opinion on a subject intimately affecting the lives of the

people when once stirred, directed and controlled would be a formidable factor in settling the mooted question of what foods are best adapted to the needs of the masses.

Federal Laws Unnecessary.

Of making laws there is no end. The latest of these is one to regulate the interstate, inter-territorial and export trade of food products. The federal law recognizes the sovereign rights of States and exercises its jurisdiction only on interstate commerce and export trade.

The making of laws is often prompted and accompanied by unworthy motives. Set prejudice and a born bias against the existing order of things, against successful institutions is many times accountable for the placing of a law on the statute book. A cardinal principle regulating wise legislation should be the observance of the rights of all interested parties. "The extreme of the law is the extreme of injustice" was the slogan which carried McClellan into the mayoralty of New York. Not the least edifying in these pending bills on edibles is the amendment which permits foreign nations to import from this country foods preserved by antiseptics.

Attempting to re-state the proposition in terms least likely to be misunderstood would require more amplification and more space than occupied by the combined bills. Denuding the present food bills before the people of their technical language, it must be apparent to all fair-minded men that vox legislatorum is not vox populi. While much in the pending food bills sounds innocuous, it must not be taken without a dose of preservative.

The Author of the Food Bills.

Since the chief chemist of the Department of Agriculture does not disclaim responsibility for the writing of the bills (heretofore and hereafter known as the Hepburn and McCumber bills) it is fair to assume that he desires recognition as the author.

In Everybody's Magazine for February David Graham Phillips say: "Power without a corresponding responsibility or sense of responsibility, this is the madness which is seriously threatening the life of the American people." This dangerous delirium caused by the desire to gain uncommon power may have bewildered the man behind the Hepburn bill, although it has been said that the intense (?) enthusiasm of the so-called pure food reformers is due to intense ignorance.

It is singular that Dr. Wylie, after making widely published and elaborately staged tests with his class of borax students, does not marshal his data and submit them for re-examination to the scientific world. Has he laid bare his secret conclusions to the eyes of lay legislators? Does he occupy the position of an iconoclast in the world of science, and what has he said or done to justify this?

POOR FOOD AND NOT PURE FOOD.

The views of the great Liebreich, one of the foremost food savants of the day, are always sure of a respectful consideration at the hands of his eminent brother scientists. No man, it may be safely said, is better entitled to a hearing than Herr Liebreich, for he never

states a proposition until he has exhausted every available research and test. Thus his dictum becomes a conclusion, a conclusive conclusion. In this respect alone, if in no other Liebreich is great. In this respect he differs from other "scientists" who are believed to arrive at their opinions by some process of a priori reasoning.

Liebreich states that if a salt improves or betters the appearance of a perishable food it also increases its wholesomeness, but he goes much further when he contends that if an element improves the palatability of a food it also enhances its digestibility. In other words, Liebreich argues that what is pleasing to the sense of taste is beneficial to digestion, or to reduce these several propositions to the barest terms would mean that

Antiseptics improve the appearance of meat.
Antiseptics make meat more palatable.
Antiseptic make meat more wholesome.
Antiseptics make meat more digestible.

A large majority of physiological chemists hold similar views, and the scattered few who disagree with Liebreich's conclusions are men who are more concerned with the quantitative aspect than the qualitative phase of the case. They are men who stand in great fear of saying aught that might tend to result in the excessive use of antiseptics. Much of the pure food legislation now in force follows the general lines of restricting what in the hands of the untutored might become dangerous. The true issue has never been met.

The use of antiseptics in preserving the appearance, the palatability, the wholesomeness and the digestibility of meats should be encouraged rather than prohibited. Legislation against the use of preservatives must needs result in poor food and not pure food.

COTTON GINNERS' REPORT.

The report of the Census Bureau on the amount of cotton ginned to January 16th showed 9,859,277 commercial bales, including 9,038,890 square bales, 747,480 round bales and 72,907 Sea Island crop bales. No account has been taken of linters obtained by the cottonseed oil mills from reginning cottonseed. These statistics will be included in the final government report. The report showed that 30,171 ginneries were operated. Counting round bales as half bales, the number ginned was 9,485,537 bales, which compares with 8,905,503 bales to December 13, 1902. There is no equal date of comparison with previous years. The amount in commercial bales gained from the crop of 1902 to December 13, 1902, was 9,311,835 bales.

OTTENHEIMER BROS. ESCAPE.

The great fire at Baltimore at'one time threatened the establishment of Ottenheimer Bros., dealers in butchers' supplies and machinery, but fortunately it was checked within two blocks of their location. They are able to fill orders as usual.

ADT NOT IN FIRE ZONE.

John B. Adt, Baltimore, Md., manufacturer of the famous fat-cutter bearing his name, escaped the fire which ravaged his city. A shift in the wind saved his plant when the fire was within a comparatively short distance.

POLITICS AND MEAT PRICES

If any indication were necessary it would be at once apparent, from the number of bills being introduced into Congress directed at packinghouse interests, that this is Presidential election year. Representatives from western states with an eye to the cattlemen's votes, and Democrats from all sections, are preparing for an active campaign in their respective districts and many of them base their plans upon an attack against the meat trade.

The hue and cry against meat prices is believed by these "politicians" to be the quickest means of securing return transportation to Washington. It makes no difference whether the prices are really high or low, the slogan of "high prices" catches the ear of the unthinking, no matter what the real figures may show. The present wholesale price of beef is 35 to 40 per cent lower than it was eighteen months ago, and a schoolboy could quickly figure that packers are selling beef on a fractional percentage of profit, but the stump speakers must have something to talk about, and the stomach of a voter is his vulnerable point.

The latest specimen of this ante-campaign ammunition is in a resolution introduced by Representative Martin, republican, of South Dakota, which has been referred to the Committee on Interstate and Foreign Commerce. This brilliant attempt at legislation asks "that the Secretary of Commerce of Labor be requested to investigate the causes of the low prices of beef cattle in the United States since July 1, 1903, and the unusually large margins between the prices of beef cattle and the selling prices of fresh beef, and whether the said conditions have resulted, in whole or in part, from any contract, combination (in the form of trust or otherwise) or conspiracy in restraint of commerce among the several States and Territories or with foreign countries; also whether the said prices have been controlled, in whole or in part, by any corporation, joint, stock company or corporate combination engaged in commerce among the several States or with foreign nations; and if so to investigate the organization, capitalization, profits, conduct and management of the business of such corporations, companies and corporate combinations, and to furnish this House, at his earliest convenience, the results of the investigation herein requested."

Nearly all the States, Congress and various national departments have been investigating packers, packinghouses and packing interests for the last two years. About all they have discovered of interest is that owing to modern packinghouse practice meat is selling now and has been for several years past at prices far below what it did in the old days of the cross-roads slaughterhouse; that the packers utilize all former waste material; that theirs is the most systematically conducted of any American industry.

The investigation called for in this resolution might be welcomed were it not a late follower of exactly similar proposed probes, but it is very uninteresting because wholly lacking in originality and of a class which has become monotonous. Besides it is necessary that the amateur detectives of Congress and legislatures cease operations for a time, so that the bookkeepers may post their ac-

counts and be ready for the next advent of the silly season.

However, the various "champions of lower prices" may be satisfied with mere introductions of their resolutions and upon these initiatory proceedings pose before their constituents as great social reformers. If exact justice were done, they would be elected to serve a two years' term in a packinghouse, a service which would make even the most valiant of them hesitate before attempting to embarrass the food supply of the country.

Upon the subject of the alleged high prices of meat the Chicago Record-Herald, admittedly a conservative organ, exonerates the packers and says that if prices are higher than the wholesale situation warrants the cause lies with individual retail dealers. In substantiation of this it shows that where there is cause for complaint by the customer it comes from one of the following reasons:

The customer orders by telephone, and does not get as good a quality as he pays for.

The customer has become so fastidious that he will buy only the best parts of a carcass, and the demand for these cuts forces up the prices.

The customer buys on credit and the dealer charges for the favor.

The customer is ignorant of meats and falls an easy prey to the avaricious dealer.

The Record-Herald quotes the cost of meat of average quality, per one hundred pounds, in five of the principal cities as follows:

Chicago							۰			0					0		,			0			. ,	 \$6.36
New York	0											0							9					7.22
Philadelphia	L		0			0			 	0	0	,							0					6.86
Baltimore .		۰	0		0							0					4							6.66
Washington			0	0			0	0				0							4		9	0	0	6.62

Adding transportation charges, it will be seen that the cost in each of the cities is practically the same.

Speaking on this subject, Louis F. Swift, president of Swift & Company, says: "Present prices of beef allow Chicago packers a very close margin of profit. It is not true that the packer, while paying much less for live beef, is selling it to the butcher at the same rate as in 1902.

"Beef happens to be plentiful now, especially choice beef, and the packers have been disposing of their stock with this in mind. The European market is a little dull, but this is merely a feature of the low prices we are quoting. Corn is high in the country, and this has resulted in liberal shipments of cattle and a consequent reduction in the cost of beef."

WORLD'S FAIR LIVESTOCK SHOW.

Concerning the importance of the live stock show at the St. Louis World's Fair, and the basis on which this exhibition is to be conducted, the World's Fair Bulletin for February says:

"The live stock interests of the world are certain to mark the Universal Exposition of 1904 as a distinct era in the history of improved stock breeding. The first cause for this is in the entirely new but eminently fitting basis upon which the exposition management has placed its recognition of live stock. A result that cannot but follow will be the establishing standards heretofore unattainable which will be recognized for a

period beyond the memories of many who will see them achieved in 1904.

"The live stock classification has been given subordinate consideration at former expositions designed to summarize the world's progress. The scope of the Louisiana Purchase Exposition of itself called for the placing of the live stock exhibits upon the independent basis, but this was urged forward by the present greatness and the possibilities of the industry in the Louisiana Purchase territory and in all the area of which St. Louis is the geographical center."

GERMAN COMMERCIAL EXPERTS.

"Handel und Gewerbe," the official organ of the German Commercial Union, edited by Dr. Soetbeer, says that the German Empire has appointed commercial experts at St. Petersburg, New York, Buenos Ayres, Val-paraiso, Shanghai, Sydney, New South Wales, Pretoria and Constantinople. The purpose of appointing commercial experts to represent the empire at the great commercial centers of the world cannot fail to have a very considerable effect upon export, and incidentally upon the import trade of the empire. Were it possible to secure the services of consular experts in the lines followed by merchants and manufacturers in their districts, there would be no great need for commercial experts, but inasmuch as such Consular services have not been secured the need of just such experts is manifest. Germany is undoubtedly getting a great deal out of such services. Doubtless the number of experts will be increased from time to time, as their value has been indicated by reports in the German papers.

AUSTRIA BARS FOREIGN MEATS.

The Austrian government, to appease agrarian interests, has been forced to issue an order prohibiting the importation of meat from the United States, South America and Australia. The arrival of a consignment of Argentine beef afforded a good excuse for putting up the bars, on the ground of the existence of the foot and mouth disease in the Argentine Republic. Therefore, America, too, was made to suffer.

The municipal council of Vienna on January 22, owing to increasing complaints from the public regarding the exorbitant prices at which ment was sold in Vienna, resolved to ask the government upon what conditions it would permit the importation of meat from the United States, Argentina and Australia. The prohibition was said to be only temporary, pending an investigation of the conditions under which the ment was exported, but as the ministry suggested various local expedients for cheaper meat, it was thought improbable that the importation of transatlantic meat would be permitted in the near future.

An advertisement in The National Provisioner catches the eye of the man who is looking for just what you have to sell—because The National Provisioner is watched and read in every department of the food trades.

THE MUTTON AND WOOL OUTLOOK

In view of the fact that the wool, cotton and silk factories and warehouses show a shortage of fabrics, the wool situation becomes more interesting to the wool grower, puller and merchant. This situation is intensified by the fact that there is a pronounced shortage in the cotton crop. More and more has grown the custom and disposition to mix wool, cotton and silk in the weave. There is never a plethora of silk; there will be insufficient cotton this year for mill purposes. In view of these facts and of the condition of the warehouses and the mixed goods trade, the wool situation takes on added interest.

A peep at the world's wool supply will be apropos. The call for woolens has so consistently increased in late years that the permanent demand is largely in excess of the annual production of wool. This state of supply and demand is the genesis of the present rage for half and three-quarter wool goods. In fact, it is hard to find an all-wool fabric, in spite of the claim of merchants that the goods which they vend are such. If fabrics were such as they are represented to be when sold, the trade would need fully 25 per cent. more fleece than is now used in the manufacture of commercial woolens. The manufacturers are in such dire straits in this respect that they are forced to the use of substitutes for wool in their mills. This raw wool shortage is also the chief cause for the use of woolen rags in the making of what is now known as "shoddy."

A Limit to Substitutes.

There must necessarily be a limit to this deception and to the use of all substitutes. When this point is reached the call upon the flock will be heavier and the price of wools will rise everywhere, even in the face of the most absolute manipulation of the raw material market. If the limit for the use of substitutes for pure wool has not already been reached, every indication points to an early arrival at that limit. Even the process of mercerizing cannot long mislead the public and stay the inevitable. All such heroic efforts show the desperate straits of the factory to fill the demand and keep down prices.

Cotton and wool are world products, used by the world's factories, worn by the world's people and fill a law of demand in the world's markets. They travel side by side in trade and are interwoven with each other in the same factory. They are controlled by universal trade conditions. Though the people of the globe differ much in what they take into their interior, they all wear wool or cotton or both. The world has been changing its methods through the generations, but it has not materially changed the fabrics of its clothes, except to wear more clothes and longer clothes. Even the wild inhabitant of the forest has exchanged the heavier fur garment for the lighter one of fabric, where he has taken on a garb at all. The universe is now wearing more wool and cotton per head of its population than ever before in its his-

Supply Not Keeping Pace.

All of this has had and is having its effect upon the available supply, which is not keeping pace with the vital statistics of the nations, because the animal kingdom is falling behind in its percentage to the human population. That is true as a world proposition. While sheep production in South America and Australasia went ahead until six years ago, both continents have suffered a setback. The balance of the world has retrograded in the matter of the relative production of sheep to population. The shortage of fleece from this discrepancy has not been made up by a supplementary greater production of cotton. The world's production of cotton has not materially varied in the last fifteen years, because the cotton zone has not been enlarged and the percentage of lint per acre planted has not been greater since 1865 than it was before. The planting area is limited and the price for a generation, until the last three years, has not been such as to encourage the risk of cultivating the cotton plant upon inferior lands. Wool and cotton have, thus, been facing constantly increasing population and, hence, a constantly increasing demand for both. The present commercial shortage in both fibres intensifies the knowledge of this fact, and the trade mind has taken such serious cognizance of the matter as to force cotton to the highest mark which it has seen in thirty-three years. Wool is also feeling the sympathetic reaction in that line.

Take a look at the field of wool production. Australasia produces about 350,000,000 lbs. of wool. South America produces about 300,-000,000 lbs. There is produced in the United States about 275,000,000 lbs. Our sheep are larger and heavier wool producers than those of the southern countries. The wool is coarser and cheaper than that of the antipodes. Europe produces, roughly, 425,000,000 lbs. of wool, exclusive of mohair. The supply of wools from Asia and Africa for the factories in the other parts of the world is small, inasmuch as that Africans and Asiatics use up their home product in domestic manufacture. The source of the commercial supply of wool produces approximately 1,350,-000,000 lbs. of fleece. All of this does not get into the channels of trade. The fact is that only 1,200,000,000 lbs. of wools enter the factories for consumption by the looms. Of course, the above is merely an estimate, but an estimate which is based upon the best available data at hand.

Small Amount Per Capita.

Even this apparently large bulk is small when it is seen to amount to only 21/2 lbs. of clean wool per head of the 464,000,000 people of Europe and North America. It looks smaller still in view of the fact that such a large per cent of the commercial wools go into carpets, rugs and other kinds of woolen fabrics not worn as human garments. The statistics of the other side of the water are hard to get at, because continental countries have such indifferent methods of census taking. The percentage of mohair grown there is often lumped with the general wool schedule and the large importation of this fibre is sometimes mixed with the factory use of the domestic article as well. The figures herein given are for clean wools. The census figures often confuse clean with greasy and unwashed wools. This sort of classification confuses the statistician when estimating wool

production and wool consumption. The factory estimate is based upon clean wools en-

The mills of the United States are a unique factor in the wool market and in fabric production. Our factories consume a larger percent of wool to population and to the amount of wool grown than those of any other country in the world. This is due to many industrial and commercial conditions. The American people earn greater wages than those abroad, excepting possibly the people of Australia, who produce wool and wear cotton. The inhabitants of the United States are the largest users of carpets and rugs of any folk on the face of the globe. They also wear more woolen clothes per capita than do the people of England or the Continent. It may be that their stuffs are shoddier because not "imported," and, hence, submit to less wear. The fact remains that they wear out more pounds of woolen garments than does the foreigner. While the goods may be somewhat cheaper in grade and workmanship, still they carry the weight in wool which takes off the wool supply.

Americans Heavy Wool Users.

This view is backed up by the fact that in 1902 the mills of this country consumed about 300,000,000 lbs. of scoured wools and mohair, of which 270,000,000 lbs. was sheep's wool. while the mills of Europe used around 875 .-000,000 lbs. That meant a factory use of something like 31/2 lbs. of clean fleece per capita in this country and less than 21/4 lbs. per capita for the population of Europe. Upon this basis, which is reasonably correct, our factories used slightly more than 35 per cent. more wool per head of the population than was used in Europe. Europe for carpets and rugs, Great Britain for bolt woolens, America for woolen wearing apparel. Those are the commercial and factory positions of the leading users of wools.

The intrusion of cotton and substitutes into the woolen fabric business may be seen by the discrepancy between the 1900 factory census of this country and the amount of wools purchased by the manufacturers for factory purposes. The United States census of 1900 states that the woolen factories of the country used 5% lbs. of raw material per head of the population in the manufacture of woolens. The entire amount of clean raw material used by the factories was 3 2-5 per capita, or a bit over 40 per cent. less than that which the 1900 census returns would show upon their face. The census of 1890 and the best available data of the actual wool purchases by mills show that the factories used less than 25 per cent. of substitutes in their products. The presumption is that woolens carried less cotton and other materials than the fleece in the decades preceding the census before the last.

The drift is towards a larger general use of other than wool fibre in woolen goods. The reason assigned for this is that the goods are just as warm, they are thus made less shrinkable, are stronger and cheaper. The real fact is that the wool supply will not stand a call for an all-wool garment, and that the maker deludes the public with the name for the sake of the price, inasmuch as the lay eye and feel cannot readily detect the presence of the 25 per cent. of cotton which is

almost invariably hidden in the filling of the latter-day alleged all-wool garment.

If the factories of America used the amount of wools credited to their woolens by the census of 1900 they would have taken off the market nearly 420,000,000 lbs. of clean wool instead of 40 per cent. less than that.

Demand Far Exceeds the Supply.

The fact that wools have held high in the face of this intrusion of cotton into the fabric is strong evidence in itself of the fact that the demand for the product of the flock is getting ahead of the available supply. This shortage in itself would naturally cause the reaction of wool prices to the present high plane.

Let us take another lesson from the census of 1900 and institute a comparison between some of its figures and those of the previous census. The census of 1890 shows that the question of the wool supply was already a serious one for the factory, and that the mill exigencies evolving therefrom had already brought the old rag and the shoddy industry into existence and given it a remarkably big development even at that time. The unraveling, bleaching, recarding and weaving anew of old woolen rags had passed the experimental stage a quarter of a century ago, and, this industry had eaten its way deeply into woolen goods trade, to the detriment of both legitimate goods and the wool trade, as it affected the grower of the fleece. According to the census of 1890 the woolen manufacturers of this country used more than 25 per cent, as much shoddy as they did sheeps' wool in their weaves. They only used a fourth as much camel's hair, mohair and such coarser fibres as they did of shoddy. The census of 1900 says that the use of shoddy in proportion to wools in the woolen mills had increased to nearly 331/2 per cent. While the use of camel's hair, mohair, etc., had increased 25 per cent., its increase in proportion to the use of shoddy was very little changed.

The official figures show the astonishing fact that our mills manipulated 61,561,000 lbs. of shoddy in the manufacture of woolens in 1890, and 75,267,000 lbs. of it in 1900. The amount of mohair, camel's hair, etc., used in 1890 was 15,600,000 lbs., and 20,000, 000 lbs. in 1900. The importation of wool yarn in 1890 was 4,200,000 lbs. This had dropped to 230,000 lbs. by the end of the century and may largely account for the increase of about that amount in the consumption of mohair, etc., in the American mills. These yarn importations have virtually ceased. The consumption of cotton as yarn and raw material has nearly doubled since the census of 1890. This cannot be entirely accounted for by the increase in the number and capacity of the cotton mills. A better explanation is in the increasing amount of cotton which is used as an adulteration in the manufacture of woolen fabrics.

Public Revolt Against Substitutes.

The re-action will set in when public sentiment recoils against the measure of substitution which is prevailing more and more among manufacturers. The wool growers have already taken notice of the sophistications of which textile trade is guilty, and increasingly so. The comparative shortage and even decrease in the supply of wool is the cause. For this reason wool has lost its grip



upon much of the hosiery and knit goods lines of trade where it formerly predominated.

This or some other release of trade must eventuate when the world's production of wool is less than it was ten vears ago. The Australian clip has fallen off nearly 40 per cent., due to the loss in sheep from drouth. In New South Wales alone there has been a decimation of 35,000,000 sheep in the last decade. The flocks of Europe have not held their own, and those of the United States have fallen off about 10 per cent, since the census of 1900. The American mills consume the entire production of American fleeces. The importations for foreign wools are mainly of the fine grade wools which are not grown in sufficient quantities on this side of the water. Our production of fine grade wools is about 25 per cent. of our shearings, or about 75,000,000 lbs. This fact shows that the sheep of this country can grow a fine wool. There was a time when the merino grade made up the bulk of our clip, but the larger bodied commercial sheep have gradually absorbed the field, to the extent that we have to import the finer fibre which enters into our superior goods.

This drift from quality of wool to size of carcass has been in spite of the higher price which merino wools always commands and also to the handier sized carcass of the merino animal for sale in the meat trade. The heavier bodied sheep, however, grow off more quickly and are readier for the market from lambing. This characteristic and tne faster growing character of the longer fleece may account for the drift in breed from the merino. This commercial packinghouse view is somewhat substantiated by the fact that at present 75 per cent. of the wool sheared in this country is grown in the middle and Western States and Territories. Of course, the sparsely settled country was more advantageous for cheaper sheep raising. The other incident was the lining up of the great meat packing industry in the Middle West. The woolen factories have retained their location more upon the Eastern seaboard making their chief habitat in the New England States, where also flourish our chief flocks of merino sheep.

Drift to the Heavier Types.

This same drift in sheep husbandry from the merino or fine wool type to the crossbred and other heavier mutton types of sheep because of the carcass value of the latter is quite noticeable in Argentina since that country has entered the frozen mutton trade. New Zealand blazed the way with this character of sheep. The Australian fibre is becoming much changed also in recent years. This drift has had much to do with throwing down the price of coarser wools, and this depression had its sympathetic effect upon the finer grade of wools.

It seems that the world's production of clean wool will not largely exceed the amount which the best data gives as 1,300,000,000 lbs., and that the world's woolen factories cannot hope to get more than 1,200,000,000 lbs. annually for the looms. This being so, the price of wools will hang around present figures and higher. The increasing popularity of mutton as an article of diet and the net yearly increase of 10,000,000 people in the population of Europe and North America alone will make a continued call upon textiles to such an extent as to make the least deficiency in the amount of wool grown felt. These new mouths will have to be fed also. Three decades have added nearly 40,000,000 more to the population of the United States to be clothed and fed. We are still growing at the rate of about 2,500,000 per year. In the meantime our flocks are becoming less. Those of Europe are about stationary, while the population there is increasing, though by a smaller percentage than ours. With stationary flocks the production of fleeces also become stationary. The only movable thing in the trade then becomes the price.

Cheaply Is Only Relative.

It is claimed that fabrics are as cheap now as almost any time in the history of the wool industry. This is only apparently

true. The garments are lighter, have less wool in them. They are afflicted with more or less of shoddy, and are adulterated with 25 to 40 per cent. of cotton, though sold as "all wool." A strictly all-wool garment of good wool is dear enough now, out of all proportion to the price of clean wools in the market. The inferior grade of the "shoddy" fabric and the fraudulent manner in which it is sold has attracted the attention of the American Wool Growers and of the National Livestock Association to such an extent as to cause these organizations to ask Congress to enforce the correct stamping of such goods, in order that the consumer may know just what he is getting at the counter. The weavers are stubbornly fighting the enactment of such a law because of the effect it will have upon the market price of such goods. Yet such a law seems to be fair; even necessary.

The trend of trade and the methods of the mill all indicate that a new cycle must be started in the wool industry. The producers will not be able to overload the market at any time, because a sheep only produces so many pounds of wool, and there are only so many sheep in the world; fewer than are needed. With a big demand for mutton and wool both sheep and wool must remain high. The latter industry hit low water mark about three years ago. Population is away ahead and the demand must continue to outgrow the supply of sheep.

GEORGIA COTTON CROP VALUES.

The Georgia cotton crop, with its byproducts of cotton seed, oil, linters and hulls, for the crop of 1903 has been estimated to be worth \$101,000,000. This computation is made by Captain R. F. Wright, assistant commissioner of agriculture and statistician of that department. The computation is made on the basis of 1,300,000 bales of cotton for the recent Georgia crop.

At 12 cents a pound this crop would be worth \$78,000,000. The hulls, amounting to 650,000 tons, are valued at \$13,000,000. The cotton seed crude oil from the seed is valued at \$7,800,000. Linters and hulls are valued at \$3,050,000.

TO MAKE THEIR OWN ICE.

Over one hundred big ice consumers of Cleveland, Ohio, chiefly hotels, meat and provision dealers and others selling perishable goods, have united to form the Lincoln Ice Co., to manufacture ice for their own use exclusively. The company has been capitalized at \$100,000, and the stock has been sold only to those co-operating in the plan. A thoroughly equipped modern plant will be erected and will be ready for operation by April 10. The capacity will be from 200 to 300 tons per day. It is stated that the company will not compete with other ice concerns, though it is intimated that any surplus may be disposed of at retail.

Several of the big slaughtering firms and packinghouses in New Orleans have adopted fuel oil in place of coal for running their plants, and have installed immense storage tanks for the new fuel, finding it advantageous to buy and store it in large quantities.

-4-

TO FIGHT THE BALL WEEVIL.

The Secretary of Agriculture has approved the plans for the cotton boll weevil investigation in the southwest, for which a special appropriation of \$250,000 has been made available. Secretary Wilson believes that the best methods for meeting the ravages caused by the boll weevil will be to put into actual practice the facts which have been accumulated by the department during the past two years in the matter of improving cultural conditions, the planting of early maturing varieties of cotton, substitutions of other crops, etc. The plans approved, which were submitted by Dr. B. T. Galloway, the chief of the bureau of plant industry, and Dr. Howard, the chief of the division of entomology, embody the following lines of investigation:

Farmers' co-operative demonstration work will involve the organization of farmers in Texas and adjacent states in such a way as to secure the cultivation of tracts of cotton under specific instructions from the Department of Agriculture. Thus, a definite working plan will be given to each farmer, the farmer himself to furnish the seed and fertilizers, if such are required. These acres of cotton will serve as object lessons and will be planned to show the practicability of growing cotton despite the presence of the weevil. Similar work will be carried on in Louisiana, where the weevil has not yet ad-

vanced. It is planned to have 8,000 or 10,-000 farmers engaged in this work.

Breeding and selection of work will have for its object the improvement of present varieties of cotton, with a view to making them more prolific and earlier, so as to prevent the ravages of the weevil. The work will be conducted on experimental farms, which will be selected with due respect to climatic soil and other conditions.

Investigations of parasites in the original home of the weevil will be made, the object being to introduce these parasites into Texas, with the hope of securing the destruction, through them, of the boll weevil.

Inspection of cotton products, their fumigation and general expenses attending the certification required by the state laws will be another line of work conducted by the entomologist. Investigation into the life history and habits of the weevil and for the general testing of poisons and machines will also be made. This work will be carried on necessarily in the boll weevil infested district. Investigations of other diseases than the cotton boll weevil, including the destructive cotton boll worm, which is one of the most serious pests in a number of the southern cotton growing states, will be carried on.

The organization of the work on the cooperative demonstration farms has begun under the charge of Dr. S. A. Knapp, who is now in Texas.

ALWAYS AGAINST AMERICA.

German class hatred of American commercial competition, particularly among the agrarians, continues unabated. Every question of tariff or commercial policy is looked at through glasses colored with prejudice of American products and fear of American competition, often to the extent of doing damage where it is hoped to avoid it.

"Mining Councilor Gotheim, a member of the German Parliament, at a public meeting of the Frankfort Association for Commercial Treatise expressed the opinion that there is little prospect for a treaty between Germany and the United States," says Consul General Guenther in a report from Frankfort. "The greatest danger, he thought, is that the United States will continue to enjoy the privileges accorded to other countries between 1891 and 1894 should the new commercial treaties raise the customs duties for the contracting countries. He expressed the opinion that no country, under the circumstances, would be ready for new treaties, and nothing else remains to be done but to give timely notice to discontinue the most-favored-nation clause in the treaty with the United States.

"In view of the great hostility of the German agrarians against the United States, it would require all the possible pressure of commercial circles to avoid, in the absence of a treaty, a tariff war with that country. American exports to Germany consist of raw materials and agricultural machinery, while the German exports to the United States consist of manufactured goods of high value. It is therefore evident who would run the greatest risk. It must also be taken into consideration that the passenger traffic across the Atlantic in recent times has been

more and more monopolized by Germany, and to the great German ocean transportation companies a tariff war with the United States would mean tremendous injury."

COTTON TO REPLACE SUGAR

A number of the leading cottonseed oil mill companies have instituted a movement to induce Louisiana sugar planters to transform their cane fields into cotton plantations next season. High-priced cotton and low-priced sugar is the argument. The companies have offered to erect a number of ginneries in Louisiana and pay highest prices for cotton and seed or gin at market rates. Acreage data is being compiled and a big boom is expected in Louisiana cotton growing. The companies identified with the movement are the Southern Cotton Oil Company, Standard Cotton Seed Oil Company, the Union Oil Company, Columbia Cotton Oil Refining and Manufacturing Company, New Orleans Cotton Seed Oil and Manufacturing Company and Delta Delinting and Refining Company.

FAMOUS BREED OF SHEEP DOOMED

The extinction of the world-famed breed of sheep known as Lueneburg-Heidschnucken seems to be an established fact. The reason appears to be the reduction of the price of wool during the last 25 years and also the transforming of the grazing grounds into potato and wheat fields. Another factor responsible for the large reduction of the sheepherds is the rigorous enforcement of preventive measures destined to stamp out prevailing diseases in German sheep centres.

TRADE GLEANINGS

Perkinston Canning Co., Perkinston, Ala.; capital, \$10,000. J. F. Jones, G. S. Todd and others, incorporators.

Toledo Rendering & Fertilizer Company, Toledo, O.; capital \$100,000. J. Gerson, S. J. Patter and others incorporators.

The tannery owned and operated by the Pennsylvania Tanning Company of Sheffield, Pa., has yearly capacity of 7,500 pounds of tanned leather. The plant cost more than \$1,000,000,000.

John N. Hinkle Company, Columbus, O.; capital, \$100,000. John N. Hinkle, David C. Beggs and others, incorporators. To make soap, carpet stretchers and pipe wrenches.

Cohoes Canning Factory, Cohoes, N. Y., will be sold at foreclosure sale on February 22 at the City Hall.

Buckeye Cotton Oil Company, Cincinnati, O., will build a plant at Atlanta, Ga., at a cost of \$200,000.

Central Ohio Canning Company, Columbus, O.; capital, \$20,000. Lewis W. Berry, Herman Shade and others, incorporators.

Proctor & Gamble Company, Cincinnati, O., has installed a water softening plant having a capacity of 35,000 gallons an hour. It purifies all the water used for feed purposes in the boiler house, which supplies the steam used in the manufacture of soap and candles, as well as that required in the refining of cottonseed oil and glycerin.

Everett, Wash., men, most of them county officials, have bought up the stock of the Mineral Soap Company, of Seattle, whose factory is at Latona. They propose to operate it at its present location for a time, but later will move it to Everett.

Manager Stern, of the Meridian Cotton Oil Mill and Fertilizer Factory, located in Hattiesburg, Miss., announce that the demand for the products of this factory by far exceed the supply, necessitating the turning down of a great many orders. The capacity of the plant is to be doubled another season.

Arrangements have been completed for the locating of a canning factory at Rockford, Md., two miles north of Seymour, on the White River. William Fultz, G. W. Warner and D. G. Stanton, all of Crothersville, who have been in the canning business, form the company, and a factory to cost \$10,000 will be erected in the spring in time to handle the next season's stock.

Bay State Leather Fibre Company, Saco, Me., organized for the purpose of manufacturing leather and rubber goods, with \$2,500,000 capital stock. The officers are: President, Otis M. Cutler, of Wakefield, Mass.; treasurer, Frank W. Merrick, Boston, Mass.

Middle Georgia Fertilizer Company has completed its new plant and is turning out 75 tons per day.

The leather factory owned by John Reilly

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in Newark, N. J., was damaged by fire. Loss, \$5,000.

Schonland Bros., Portland, Me.; capital, \$30,000. Richard R. Schonland, president; Chas. Schonland. Manufacture sausages and meet.

Knapp Dressed Beef Company, Sandusky, O., has been incorporated to do a general packing business. Charles Knapp is manager.

SOAP INDUSTRY IN CHICAGO.

The soap industry in Chicago is in a more satisfactory condition and on a firmer basis than it was last year. In supplying the increasing demand the factories have made \$1,650,000 more soap in 1903 than they did in 1902, and the present year's product reaches the \$12,000,000 mark. The prices of oils and fats used in soapmaking fell from the high rates which the manufacturers were obliged to pay in 1902, and they say they improved the quality of goods offered to the public. It is claimed that Chicago factories have been placed at a disadvantage through having been forced to grant large increases of wages in competition with soap made in New York, Detroit and other cities where there are no unions and where no corresponding increase in wages have taken place.

HIPPOPHAGY PARISIENNE.

That our epicurean friends in the Attiens on the Seine should have taken to the enjoyment of indulging in horse-roast socials is, if surprising, true nevertheless. A large dinner given recently by an enthusiastic "hippophag" at the well-known hostelry Nefour was a grand success, being attended by no less than 96 persons.

A reliable source is quoted to assert that a great many Parisians don't know a good horse-roast when they eat it. About 36,000 horses and mules were slaughtered in Paris last year, and the city administration has just voted 7¼ millions of francs for the erection of a horse-abattoir.

INVENTIVE NEW YORK.

The 1903 report of the United States Patent Office places the number of patents applied for at 50,213, of which number 31,630 were granted. Of these 27,819 were granted to Americans and 2,763 to foreign applicants. New York State claims 4,573, or one patent for every 15 of her population. Neglecting Alaska, the state of Missouri leads the procession of inventory evolution—at the rear end, however, receiving but 17 patent grants during the year. Japan received six, Alaska three, and China, Porto Rico and Turkey each one patent right.

PROPOSALS

PROPOSALS FOR SUBSISTENCE STORES.—Office Purchasing Commissary, U. S. Army, 39 Whitehall Street, New York City, N. Y., Feb. 6, 1904.—Sealed proposals for furnishing and delivering subsistence stores in this city for the month of March, 1904, will be received at this office until 11 o'clock A. M., on February 16, 1904. Information furnished on application. Envelopes containing bids should be marked "Proposals for Subsistence Stores, opened February 16, 1904," addressed to Major D. L. BRAINARD, Commissary, U. S. A.

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AMERICAN SAUSAGE CASINGS.

METHODS OF STEER FEEDING.

In a recent bulletin on "Methods of Steer Feeding," the director of the Pennsylvania State College experiment station, says: "In recent experiments at this station, in cooperation with the Bureau of Animal Industry of the United States Department of Agriculture, the amount of heat actually produced by steers on light rations was determined. The results indicate that even on a maintenance ration such an animal is producing more heat than is required to maintain its body temperature in fairly warm suround-If this is the case, it seems evident ings. that the fattening steer, with his much larger consumption of food and consequently greater heat production, is really developing an excess of heat, and that consequently a moderate exposure to cold would not, as has been quite generally taught, cause any increased combustion of material in the body. Experi-

FOR SALE OR LEASE

Small Packing House in one of the larger Mississippi river cities, now in operation.

Present owner, who has been operating it successfully for over 25 years wants to retire.

A good chance for a young man with some capital, who understands the different branches of a packing house thoroughly, for further particulars, address

R. D., care

THE NATIONAL PROVISIONER.

NEW YORK

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SOUTHERN RAILWAY AND MOBILE & OHIO RAILROAD

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They Save Time, Labor and Money for the butcher, and show him always exactly " what's doing"

Let us tell you more about them

THE GLOBE REGISTER COMPANY, Cincinnati, Ohio.

ments at other stations, notably at the Missouri station, as well as the experience of practical feeders in the middle West, have gone far to confirm this conclusion. In not a few cases it has been found that steers fat-

tened in open sheds or even in open yards showed apparently greater health and vigor, ate their food more readily, and produced proportionately larger gains than did similar animals in a fairly warm barn."

Тhe NATIONAL PROVISIONER

NEW YORK AND CHICAGO

THE WAR IN THE EAST

For once the expected happened. It was apparently inevitable. Russia cannot prosper without an outlet to the sea for her enormous territory and its products. Her repeated attempts to gain such an outlet in European waters having been frustrated by the combined actions of the Powers under British leadership. Russia systematically, during the last twenty years, forced her way to the Pacific, where Japan alone could efficiently stop her progress. The energetic Japs could not wait until the Siberian Railroad should be perfected to complete working order and the position of Russia should be made impregnable. So the irresistible conflict was hastened, probably to the delight of the European Powers.

The United States of America, since the acquisition of the Philippine Islands, have lost their traditional position of happy indifference to all events in Asiatic territories. Nevertheless, there is not the least reasonable cause for any apprehension that our interests could suffer. Nothing but semi-criminal meddlesomeness could involve the United States in the Eastern conflict. Our legitimate position, and the only one we should reasonably hold, is to furnish goods, especially food, to the fighters. We have plenty to spare and ought to get rid of it at good prices.

GERMANY TAKES OUR MEAT

Germany gets hungry as do other countries, and must have foreign meat, because there are not enough cattle, hogs and sheep in that country to feed its big population. Germany has not half enough meat from its own kill. The Agrarians succeeded in excluding American cattle and carcass beef to give a better local market and higher value to their own stock. The establishments there are poorly equipped for the cure, proper conservation and shipment of meat products. The agrarian element excluded our cattle and carcass beef on the plea of the general health, though the German cattle are the more diseased of the two. While American cattle were not specifically excluded from the Fatherland in just so many words, they were effectively barred by the imposition of shipping conditions which made it virtually impossible to get them or their carcasses in.

But Germany has not been able to get along without American meats. In view of the great bluster over there about American meat products it is interesting to compare the course of the export trade of this country with that of Germany during the last three years. We have sent to Germany direct and to German outports the following amounts of beef products during the last three years:

1901. Lbs.	1902. Lbs.	1903. Lbs.
Pickled and cured beef8,000,000	9.645,000	10.485.000
Canned beef 450,000	670,000	1,840,000
Tallow7,125,000	3,685,000	12,430,000

Much of the German military and naval ration does not enter into the regular export list, as the stuff does not go direct to Germany. The growth in our export of beef products shows that 1903 made the heaviest pull upon American shipments in this line because the silly inspection laws of Germany made the need of more American meat felt. The remarkable fact has been the immense growth in the export of tallow over the low year of 1902. The exports of tallow to Germany in 1903 nearly trebled those of the year previous. The German factories needed it; could not get along without it-that was the reason. Our exports of canned beef to Germany last year about trebled those of 1902, and more than quadrupled those of the year before that. There has been a steady growth in our pickled and cured beef products to Germany since 1900. Those of 1903 show an increase of about 25 per cent. over those of 1901.

Germany made a senseless war upon American pork and then had to buy it. The following estimated exports of pork products to that country from the United States shows the effect of the inexorable law of supply and demand:

wiid demand		1000	1002
	1901.	1902.	1903.
	Lbs.	Lbs.	Lbs.
Hams	2,810,000	1,500,000	1,010,000
Bacon	22,000,000	17,752,000	16,655,000
Pork	8,600,000	6,150,000	3,500,000
Lard 19	92,000,000	15,245,000	185,310,000

These figures include the estimated amount of hog products consumed by the German army and navy, that does not enter the German customs, nor is it entered out from here as German exports. They do not, however, include the American products which enter Germany from England and other European countries. These, based upon the figures of the Fatherland, must amount to 15 or 20 per cent. more. Last year Germany paid us more for lard than she has in many years. Our meat trade is pounding away at her door, and she must let it in. Her people need our food.

THE IOWA IDEA

The beef and hog feeders of Iowa are bruiting a plan for establishing a packinghouse in the corn belt. They have been moved to this by the fact of the low prices this past year for hogs. They seem to forget, however, that hogs were higher in 1903 than they were for many years previous—barring 1902, when all livestock was abnormally high. Products were also high. Just what purpose a raisers'

plant will accomplish on a low products market is not stated, nor is it certain.

The breeders and feeders of livestock were spoiled, and had their heads twisted by two years of prosperity. The top notch cannot always be maintained, no matter how much such an end may be desired. Iowa is enjoying high corn and high wheat, also high butter and dairy products. If the feeder has also to buy high hogs and high cattle from the breeder, and the packer has to buy the combined highness in his abattoir stock, meats will again soar to that point at which the complaining stockman joins the eating public in a general kick. Iowa is a bit hoggish under her corn belt. She seeks to sell everything high and then complains at having to pay the price when she sits at her own table. Present conditions are favorable to the stock raiser and against the slaughterer of meats.

SILLY HIDE AND LEATHER TALK

The shoe manufacturers of Columbus, O., are either ignorant or designedly state an untruth. For the former they are to be pitied, for the latter fault, to be detested. In their petition to Congress for the repeal of the 15 per cent. duty on hides they make the following queer statements: "The tariff on hides does not protect the raiser of cattle. The hide is a by-product of the slaughter of animals for other purposes than obtaining the hide, and has no influence on the price of cattle," and "The price of hides has doubled since the imposition of this (15 per cent.) tariff."

The first statement is equivalent to saying that the trimming of shoes, the blacking and finishing of shoes and other incidents to shoemaking are not to be considered in the price of the output of the factory because they are mere incidents, and because shoes are not made just for the purpose of polishing them. The same logic applies in the cost of leather making. An 80-lb. beef hide at 12c. per lb. is worth \$9.60, or 34c. per lb. of the live weight of a 1280 lb. steer. The same hide at 6c. per lb. is worth \$4.80, or just half of the above amount. Yet the shoe and leather man would ask the sane mind to believe that such an incident of value or price has no bearing upon live cost.

It is a silly thing to say that a 15 per cent. embargo at the custom house makes 100 per cent. difference in the market price of hides, when it is so easy to ship things. As a matter of fact such is not the case. The price of hides has followed cattle up and down the scale, receiving extra strength from the big profits in leather which created the strong demand for hides for leather production.

The

National Provisioner

NEW YORK and CHICAGO V V

Published by

THE FOOD TRADE PUBLISHING CO.

(Incorporated Under the Laws of the State of New York.)

DR. J. H. SENNER..... President

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This invention is a Casing for boiling Boneless Hams. It is a device that saves time, labor and money. It saves shrinkage, increases the flavor of the meat, and gives the ham a beautiful shape and appearance.

Hundreds of Packers are now using The Ham Retainer in all parts of the country. Why not be up to date and adopt The Ham Retainer at once. We invite your correspondence

THE HAM CASING COMPANY, PATENTERS AND SOLE MANUFACTURERS, 1217 FILBERT STREET, PHILADELPHIA, PA.

EXPORTS SHOWN BY STEAMERS.

Following were the exports of commodities from New York to Europe for the week ending February 6, as shown by Lunham & Moore's statement:

	Oil-				—B	eef-		-1	ard-
Steamers-Destination.	Cake. Ch	eese. 1	Bacon.	Butter.	Tes.	Bbls.	Pork	. Tes.	Pkgs.
Georgie, Liverpool			2140		320		81	851	5805
Majestic, Liverpool		972	1086	945	15	107		130	920
Saxonia, Liverpool		1223	2225	1292	125			370	6665
Philadelphia, Southampton		200	2042	950					1450
Marquette, London		467	65			525	275	300	10238
Wells City, Bristol		1508		****	50			50	2790
Boston City, Bristol			165				25		2000
Idaho, Hull		890	1271		31		25	1253	21248
Ethiopia, Glasgow	. 1053	2009	805	200	79			97	620
Graf Waldersee, Hamburg			60	263		5		950	5331
Rotterdam, Rotterdam	. 8417		75			50		1045	1250
British Empire, Antwerp	. 19707		100				45	70	3150
Zeeland, Antwerp			695		25		100	245	2150
Frankfurt, Bremen			50	257		210	100	50	600
La Champagne, Havre			25					25	225
Kentucky, Baltic			125	332		776		1655	2070
Prinz Aedalbert, Mediterranean			300					50	400
Nord America, Mediterranean			290			25		150	307
Perugia, Mediterranean	. 608	30	218					10	350
Kurdistan, South Africa									30
Norman Prince, South Africa							10		70
							-		
Total	. 39599	7299	11737	4239	645	1698	661	7301	67669
Last week	. 20131	4797	10047	2040	583	815	450	6727	71732
Same time in 1903		3750	10351	756	717	481	629	6372	49324

GROWTH OF OUR EXPORTS.

The growth of the foreign commerce of the United States from 1893 to 1903 presents some interesting facts. The Department of Commerce and Labor, through its Bureau of Statistics, presents a table showing the imports and exports by grand division in each calendar year from 1893 to 1903, thus bringing the figures down to the very latest date possible. This table shows that the exports from the United States to Europe have grown during the period named from \$680,-000,000, speaking in round terms, to \$1,087,-000,000 or 60 per cent.; those to North America, from \$125,000,000 to \$227,000,000, or 81 per cent.; to South America, from \$34,000,000 to \$46,000,000, or 35 per cent.; to Asia and Oceania, from \$31,000,000 to \$92,000,000, or 197 per cent.; and to Africa from practically \$5,000,000 to \$31,000,000, or 489 per cent.; while the growth in total exports has been from \$876,000,000 in 1893 to \$1,484,000,000 in 1903, or 69 per cent.

Among the most strongly marked instances of growth in our commerce, and especially in the exports is that of Canada. In 1893 the total oxports of the Dominion of Canada amounted to \$57,121,178; in 1898, at the middle of the period, they were \$90,388,065; in 1903 they were \$131,452,562. This makes the percentage of increase since 1893 in our exports to Canada 131 per cent. In imports from Canada the growth was from \$34,492,332 in 1893 to \$53,291,860 in 1903, an increase of 54 per cent. To Mexico the growth in our exports was from \$16,551,255 in 1893 to \$43,-510,337 in 1903, an increase of 163 per cent.

In imports the growth was from \$32,372,998 in 1893 to \$41,291,752 in 1903, an increase of 27 per cent.

THURSDAY'S CLOSINGS.

Provisions.

The early market to-day was weak. It sympathized with grain and general profit taking. Wheat was down early %@1%c., and corn 1/2c. Pork then sold off 30c., and lard and ribs 2@5 points. But there were reactions and generally fitful, feverish situations; as these are the ordinary conditions after excited situations, there is nothing to add in the way of features to those outlined in our weekly review in another column.

Cottonseed Oil.

Undertone strong and as in our weekly review upon another page.

Tallow.

Strong; no sales of city, hhds., for the week; 5c. bid for it, and melters holding off. Weekly contract deliveries made at 5c. No change from the situation as outlined in the weekly review in another column.

Oleo Stearine.

Strong at 63/4c. Pressers unwilling sellers and ask more money.

OBJECT TO FERTILIZER PLANT.

A powerful movement is on foot at Norfolk, Va., to prevent the rebuilding of the plant of the American Fertilizer Co., recently destroyed by fire, on the ground that it is a public nuisance.

TECHNICAL AND SCIENTIFIC

INTERESTING TECHNICAL POINTS.

Sheep casings, packed in tierces, run from 400 to 800 bundles, and in kegs from 50 to 200 bundles. A bundle runs from 350 to 400 feet and will stuff from 65 to 70 lbs. meat. Selection varies stuffing capacity and also value. The best is the cheapest always, in casings.

Seventy grains of boracic acid per quart of any vegetable or animal paste will prevent decomposition for an indefinite period. This is applicable to matter to be used as a paste (sticker) which contains flour, etc., blood,

Meats for canning should be in 85° pickle for 25 days. Boil at 212° F. for 30 minutes, cut up and stuff in cans, boil and spout until settled, then seal.

One gallon of cold water (8.339 lbs.) will dissolve 3.03 lbs. of salt, and of boracic acid .33 lbs. A saturated solution of borax is 1 lb. per 11/2 gals. water, or 1 in 12.

An excellent East India relish can be made as follows: 12 green sour apples, 2 green peppers, 6 green tomatoes, 4 onions, 1 cupful raisins, 1 quart vinegar, 2 tablespoonfuls each of mustard seed and salt, 1 tablespoonful powdered sugar, 2 cupfuls of brown sugar. Seed the raisins and peppers, then add tomatoes and onions and chop very fine. Boil vinegar, sugar and spices, then add chopped mixture and simmer one hour. Then add apples, pared and cored, and cook slowly until soft. Seal in small bottles. This recipe from an English officer who spent many years in India.

Pig tongues will cure in 15 to 20 days in 60° pickle. Shanks in full strength (100°) pickle, 20 days. Feet same as shanks. Beef hams, 20 days in 70° pickle.

Fully cured meats may be shipped (when pickle is necessary) abroad in 50° pickle, using 1 oz. boracic acid per 100 lbs.

Hams pumped with full strength pickle and packed in tierces with 70° pickle, 5 lbs. sugar and 15 ozs. saltpeter, will smoke in 25 days; viz., 20 days in pickle and 5 days out.

the presence of

An authority says "Pickles for following should be: 30° for tripe, 40° pigs' feet, 50° corned beef, 60° small pork and 6 lb. ham, 70° for 11 lb. ham, 80° for 16 lb. ham, 90° for 20 to 24 lb. ham, and 100° for mess pork,

New York shoulders averaging 14% lbs. (61 pieces, 900 lbs.) weighed out of pickle in 72 days (pickle soaked) 985 lbs., or 328.33 lbs. per tierce. Converted into boneless ham they weighed up as follows: Lean meat, 512 lbs.; fat, 415 lbs.; bone, 55 lbs.; total, 982 lbs. after being soaked 18 hours. Boneless ham came out of smoke weighing 455 lbs.; a loss of 12%. Fat shrank 25% in rendering, leaving 312 lbs. of lard.

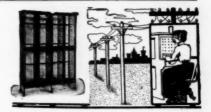
TO RESTORE FADED THERMOMETERS.

"At low temperatures mercury becomes viscous as it approaches its melting point, and does not flow down the tube, and therefore fails to indicate the coldness to warrant the consistent shivers," says the "Electrical Review." "Alcohol thermometers are the more reliable at low temperatures, as no degree of natural cold approaches its solidifying point, and its fluidity is not impaired by such ex-

"It is necessary to color the alcohol used in thermometers to render it easily observable, but the liquid in the tube frequently loses its color to an extent which renders it almost indiscernible. This loss of color is not due to fading, as is generally ascribed to be the cause, but to a subsidence of the pigmentary material used to give the tint. The color in the tube can be restored by stirring the alcohol, which is easily accomplished by means of two basins of water, one heated to a temperature slightly less than the highest on the scale of the thermometer, and the other containing cold water, ice water being preferable.

"If the thermometer is alternately immersed in the two basins and allowed to remain in each long enough to reach its temperature, the circulation caused by the expansion and contraction of the alcohol will stir up the solution so the portion in the capillary tube will become colored again. From six to ten of these alternate exposures to extremes of temperature are sufficient to restore the color to the alcohol in the tube.'

To them the possibilities of



EXPANDED

METAL LOCKERS

are built from open-hearth sheet steel that has been cut and opened into diamond shaped meshes that are neither jointed or interwoven.

Material will not warp or sag, and is so treated that it will not rust.

Lockers are built in units to fit any space.

MERRITT & CO.

1009 Ridge Avenue, PHILADELPHIA, PA.

A PORK SAUSAGE FORMULA

A good sausage trade is well worth working up, both fresh and cured sausage. Pork sausage may be made on a cheap basis as follows: Use 55 to 65 lbs. rough lean beef and from 35 to 45 lbs. pork fat, 100 lbs. in all; chop fine and mix thoroughly, amalgamating therewith about 21/2 lbs. good potato flour and sufficient water to make of the right consistency. Stuff in hog casings not too solid, otherwise they will burst in cooking. Seasoning for above, 24 to 28 ounces fine salt, 6 ounces white pepper, one ounce each of powdered cayenne, mace and nutmeg. A little sage gives a very agreeable flavor. In summer time mix in 2 ounces finely powdered boracic acid to prevent "souring."

-0-FALLACY OF THE TUBERCULOSIS TEST.

The fact that but little reliability can be placed on the tuberculin test in connection with cattle imports finds another illustration in the annual report of animal diseases in Germany for the year 1902. Out of a total of 47,688 head imported from Denmark, 47,430 were subjected to the test, and from indications appearing 922, or 1.9 per cent., proounced afflicted with tuberculosis and rejected. The rest were transferred to the various abattoirs and slaughtered. The inspection then showed that 9,069, or 20.1 per cent. of those cattle that passed the test successfully, were afflicted with tuberculosis.-Internatl. Fleisch. Ztg.

THE CHINESE "ALUM MOUNTAIN."

German papers report that an alum mountain exists in China, which is a source of wealth for the people in its vicinity, as they annually take many tons of alum from it. The alum is quarried in immense blocks, is then heated in large ovens, and afterward dissolved in boiling water. From this liquid the alum crystallises in layers of about half a foot in thickness, which are cut up in blocks of 10 lbs each .- Oil and Colorman's Journal.



cylinder oil in condensation.

JOSEPH DIXON CRUCIBLE CO., Jersey City, N. J.

Dixon's Pure Flake Graphite, in the lubrication of steam, water and ammonia compression cylinders, offer the chance for unusual economies.

WRITE FOR BOOKLET 88C AND A SAMPLE CAN.



FOR PURCHASING DEPARTMENTS

A NEW VACUUM JAR.

To obtain a perfect vacuum jar has been the problem in the minds of many. The American Vacuum Can & Machine Co., of Bainbridge, N. Y., has solved this problem successfully. It has a jar with the use of which there can be no possible taint, mildew, bacteria or insect breeding. When sealed in the machine made by this company, or in any machine capable of creating a vacuum of from twenty-eight to twenty-nine inches,



these jars are an efficient safeguard against ptomaine poisoning. Further, being sealed under so high a degree of vacuum, climatic conditions do not affect the contents, therefore they are unequalled for preserving biscuits, cakes, cereals, tobacco and all articles which are damaged by contracting moisture.

As will be noticed from the illustration herewith, the construction of the jar and cover is very simple. A small air space is left between the article canned and the cover to allow an effective vacuum to be drawn, and thus also does away with all possibility of rust or taint as a result of contact.

The style of jar as shown in the cut is designed especially for meats, fruits, jellies, butter and other articles which it is desirable to remove from the jar without disintegration of parts. This jar can be easily and nicely packed, and displays the contents to the best advantage. This patented closure can be adapted to any style of jar or can. Correspondence is solicited, and descriptive booklets will be sent upon request to those interested.

----CONWAY FAT SKINNING MACHINE.

Elsewhere in this issue is found an illustration of one of the late products of Wm. R. Perrin & Co., Chicago. The operation is R. Perrin & Co., Chicago. The operation is clearly seen to be one saving labor, time and producing results absolutely satisfactory.

The cut shows distinctly how the pieces of fat from the back fall into the truck on the side and how the skins pass over and are taken off at the other side of the machine. The Conway Fat Skinning Machine will skin six hundred backs per hour, and do consistent and perfect work. The skins are as nearly free from fat as mechanical ingenuity can make them.

That the Conway machine turns out the very highest class work could be evinced in no stronger way than by citing the fact that tanners are constantly inquiring from Wm. R. Perrin & Co., for the name of the packers who use this machine, so that they could know the best source from which to obtain skins. A number of these machines are now

in use among the larger houses, and have been installed there after other machines were tried and used.

SALES REGISTERS.

Business success is nowadays spelled "S-y-s-t-e-m." There was a time when men "S-y-s-t-e-m." There was a time when men became successful through force of circumstances or in spite of them, but in this era success is absolutely dependent upon systematically executed plans. The nearer any business system can be reduced to the mechanical the better, for machines do not allow for human carelessnes, incompetency or other lack of capacity. It is for this reason that registers of various kinds have become that registers of various kinds have become so popular. With accurate machines of this type and clerks drilled into the habit of using them, hundreds and thousands of dollars have saved to merchants in all classes of business.

One of this class of machine which perhaps stands pre-eminent is the "Globe" autographic sales register, shown in the accompanying illustration. This business necessity is made by the Globe Register Company, of Cincinnati, O. Referring to it the company

The fundamental principle of the register system is to secure an accurate accounting of all transactions in the ordinary conduct of business. Our autographic register system is more easily adapted to all details of business than any other known method.

To secure an accurate accounting of each transaction you must have an itemized rec-



The Globe autographic system gives it. A customer on entering your store must do

one of four things:
He buys something for cash. He buys something on credit. He pays you money on account.

You pay out money to him.
All these transactions are recorded by the Globe register system in a simple way that reduces the possibility of an error, and se-

cures an accurate accounting.

In the event of a cash sale, you enter the sale over the machine, itemizing and carrying out the amounts and totals; issue it thus, handing the original slip to the customer, thereby making him a witness of the correct-

dispense entirely with counter books and loose tickets, and by issuing a bill from the register with each sale, goods cannot get out of your store without being properly accounted for, as in making the bill you have made the charges at the same writing. The original bill goes to the customer, the duplicate to your book-keeper, who can enter or file it, and the triplicate record remains folded in the machine as a check on your book-keeper, enabling you to know if he has properly cared for every item that has left your store. In smaller stores the duplicate is placed face downward on a pin file at the side of the register, and posted directly to the ledger at night by the proprietor.

Because of "forgotten charges" merchants lose hundreds of dollars every year. When you sell goods for cash you have received their value, but when you sell on credit you have to get it later, therefore you should have a system that will absolutely protect you against forgetfulness and errors.

The Globe register furnishes a systematic

you against forgetfulness and errors.

The Globe register furnishes a systematic and simple method for recording either all or the business transactions of a retail establishment, namely: cash sales, credit sales, cash received on account and cash paid out for expenses. Its use dispenses with pass-books, blotter, cash books and register, and in some instances with all books. Autographic registers are not untried books. Autographic registers are not uncreased novelties which are very promising in theory, but disappointing and inconvenient in practice. They provide a system, the value and merit of wheh have been demonstrated by vears of actual use and constantly increasing sales, some firms using several hundred.

AN IMPORTANT QUESTION.

Operators of refrigerating machines are now engaged in putting their plants in condition to show greatest amount of cold production during the next summer, and one question of supreme importance is, "What brand of ammonia should be used?" Anhydrous and aqua ammonia of inferior quality will not permit refrigerating machinery to show its maximum cold producing capacity, and at the same time occasions larger consumption of fuel and strain upon the machinery. It requires years of experience, as well as a thorough chemical and mechanical knowledge, to manufacture ammonia of highest quality, but its manufacture has now been brought to what might be termed the acme of perfection.

The National Ammonia Co., with main offices at St. Louis, Mo., have just completed two new ammonia factories, one at Philadelphia, and one at St. Louis, which are the largest and most modern plants of the kind in existence. The gentlemen composing The



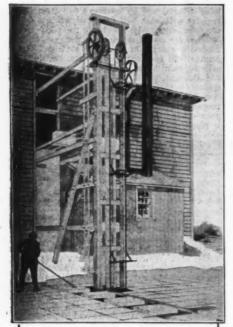
ness of the entry. The duplicate goes with the money to the cashier, and from this duplislip the cashier makes the change. goods have not been sold at proper prices, or any mistakes have been made in addition, your cashier can locate the errors. The triplicate record remains in the machine, serving as a check against the original and duplicate slips. This triplicate being folded and not rolled, is easily referred to. It is like a little book constantly being made by the reg-ister, in a separate locked compartment, where it cannot be altered by clerk or cashier,

giving you absolute security.

In the use of the register for charge sales you will derive even more benefit, as you

National Ammonia Co. were the first to manufacture anhydrous ammonia, and with their long years of experience and the close study they have given the business, no doubt their claims of the very best quality are justified.

Prompt service is another matter of importance, and, as will be seen from The National Ammonia Co.'s advertisement on another page, stocks and representatives at all commercial centers enable ammonia users to obtain their ammonia conveniently and promptly at all times.



ICE ELEVATORS

FOR-

Filling Houses

-FROM-

Water or Platform

HEADQUARTERS FOR

Ice-Handling
Machinery
and Tools

OATALOGUE

GIFFORD BROS. HUDSON, N. Y.

ICE AND REFRIGERATION

CORPORATION NEWS.

Wisconsin Lakes Ice & Cartage Company and the Pike & North Lakes Company have been consolidated under the name of the former.

Choctaw Iee & Cold Storage Company, South McAlester, I. Ter,; capital, \$2,000. C. W. Dawley, of St. Louis, is president; H. W. Adams, Dallas, Tex., vice-president, and W. S. Andros, South McAlester, secretary-treasurer.

Shanghai Dairy Company, Spring Grove, Wis., capital, \$2,500. Fred Ties, J. B. Nolty and others, incorporators.

A. H. Knorr Ice Company has reduced its capital stock from \$100,000 to \$60,000.

Waukesha Mineral Water Ice Company, Waukesha, Wis.; capital \$150,000. Henry W. Kent, Paul G. Zedler and others, incorporators.

Lincoln Ice Company, Cleveland, O.; capital, \$100,000. C. S. Horner and others, incorporators.

S. W. Love and G. S. Johnson have purchased the stock of the Gallatin Ice Company in Gallatin, Tenn.

Glendale Co-operative Company Creamery, Glendale, Wis.; capital, \$2,500; A. D. Moore and others incorporators.

Mason Cheese and Btuter Co., Mason, Wis.; capital, \$1,500. E. J. Ohr and others, incorporators.

Kosher Dairy Company, Hoboken, N. J.; capital, \$10,000. John J. Mainell, John B. Walsh and others, incorporators.

The Merchants' Ice Company and the Consumers' Ice Company, Norristown, Pa., two corporations which have for years been manufacturing the borough supply of ice, are to be consolidated, and the two plants will be operated by the one management.

The Manatee Ice & Cold Storage Company, Jacksonville, Fla. The capital stock of the company is \$30,000, and it will manufacture and sell ice, transact a cold storage business and do a general jobbing business in fresh and other kinds of meats and all kinds of vegetables and fruits and act as brokers and commission merchants. W. U. Fielder, T. J. Brooks, J. W. Branan and A. E. Stebbins are named among the incorporators.

NEW PLANTS.

Houston, Texas. — C. H. Thompson will build a cold store for poultry.

Crystal Springs, Miss. — A company has been organized to build a fertilizer and an ice plant.

Amsterdam, N. Y. — Armour & Company will build a cold store.

Leola, S. D.—Lester Story, of Flandreau, will remodel and improve creamery.

Tomak, Wis.—Farmers' Co-operative Butter Association will build a \$3,000 creamery.

Hillyard, Wash.—Prest & Clark will put in

Lufkin, La.—An ice plant will be erected by the Lufkin Commercial Club.

Portland, Ind.—A \$6,000 creamery and ice cream plant will be built. Oscar Warnock and D. J. Argo are interested.

Terre Haute, Ind.—Merchants' Ice & Cold Storage Co. will increase capacity of plant.

Huntsville, Ala.—A company will build cold storage plant.

Florence, S. C.—Phoenix Ice Company will double capacity of ice plant.

Navasota, Texas. — A creamery will be built: Board of Trade is interested.

Washington, D. C.—M. J. Rosenau, custodian of P. H. and M. H. S., Treasury Building, wants bids on refrigerating machinery. Specifications forwarded at his discretion.

Lawton, Okla.—Lawton Ice & Fuel Company, Lawton, Okla., is building an ice and cold storage plant to cost \$48,500. H. A. Loyd is general manager.

Spokane, Wash. — Diamond Ice & Fuel Company has asked for bids for a \$50,000 ice plant to have a capacity of 40 tons per day. F. W. Branson is manager.

Cleveland, O.—Lincoln Ice Company will build an ice plant to have a capacity of 200 tons per day, to be in operation before the 1st of May.

Harrington, Wash.—A cold storage plant will be built in connection with a poultry farm.

Everett, Wash.—Frye-Bruhn Meat Company will build a cold storage plant to cost \$20,000.

Portsmouth, O. — Portsmouth Brewing & Ice Company will build an ice plant.

FIRE AND ACCIDENT RECORD.

Centre Point, Ia.—The creamery and ice house owned by J. W. Dellinger was destroyed by fire on Jan. 30. Loss, \$5,000.

Jamaica, L. I.—The ice plant owned by John and Rudolph Reimer was burned on Feb. 5. Loss, \$50,000.

GIANT INSULATING PAPERS

STANDARD FOR EIGHTEEN YEARS



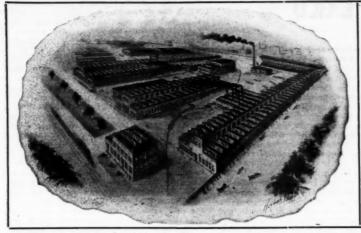
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ICE and REFRIGER-ATING MACHINERY

Louisville, Kentucky.

FRESH AND COLD STORAGE BUTTER.

There has been much improvement in the butter market in New York during the last week and cold storage stock has come out more freely than during the same period this winter. The cold wave has had a tendency to increase consumption and out of town demand has been liberal.

The quantity in the coolers has steadied the market, the highest quotation not going above 25c. for fresh extra creamery. Held

NEPONSIET LAMINOID INSULATING PAPERS

EF. W. BIRD & SON: ESTABLISED 1817 CAST WALPOLE, MASS. - NEW YORK- CHICAGO.

extras 20@21c. The cold wave caused a reduction in production of fresh butter, but the coolers supplied the deficiency. Prices in New York on Feb. 9:

Creamery extras, per lb., 24½c.; creamery firsts, 22@24c.; creamery seconds, 17@21c.; creamery held extras, 20@21c.; creamery held firsts, 17@19c.; creamery held seconds, 15@16c.; creamery held thirds, 14@14½c.; state dairy tubs firsts, 18@20c.; packing stock, held, 12½@14c.

In Boston prices advanced and there was a liberal demand for cold storage stock. Storage creamery sold freely 21@22c. The market was improved There was recorded 134,-203 tubs in the coolers, as compared with 103,347 for same date last year. Prices fresh creamery, 23@23½c.; firsts, 21@22c.; held. 21@22c.

In Philadelphia, prices advanced on small receipts and the market was strong. Prices: Western creamery extra, 25c.; firsts, 24½c.; held creamery, 16@21c.

In Chicago the market was firm, at 24c., and held stock was quoted slightly lower than in the East.

FRESH AND REFRIGERATOR EGGS.

The cold wave this week made a very material reduction in receipts of eggs in New York, as its influence was felt in the southwestern states. The mild weather in that section two weeks ago led to a liberal production and prices somewhat reduced. On Feb. 9 prices in New York were about the same as last week and were quoted as follows:

Nearby fresh gathered extras, 33c.; nearby fresh gathered seconds to firsts, 30 to 32c.;

Western, fresh gathered firsts, 32c.; Western fresh gathered seconds, 30 to 31c.; Kentucky, fresh gathered firsts, 32c.; Kentucky, fresh gathered seconds, 30 to 31c.; Tennessee and other Southern, fresh gathered firsts, 31 to 31½c.; Tennessee and other Southern seconds, 29 to 30c.; Western fresh gathered dirties, 27 to 29c.; checked eggs, 24 to 26c.

In Boston the market opened firm on Mon-(Continued on page 35.)

W. H. MOWER, GEORGE R. BOWER, General Manager. Secretary and Treasurer

The AMMONIA CO.

Gray's Ferry Road and Twenty-ninth Street PHILADELPHIA, PA.

MANUFACTURERS & DISTILLERS

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America's Oldest Ammonia Plant

AQUA ANHYDROUS SULPHATE

26° AQUA

Especially Refined and Purified for

ABSORPTION MACHINES

ANHYDROUS

ALWAYS PURE

ALWAYS DRY



DISTILLED FROM AQUA AMMONIA OF OUR OWN MANUFACTURE

FOR REFRIGERATING AND ICE MAKING
INQUIRIES INVITED

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ICE-MAKING AND REFRIGERATING MACHINERY

AMERICAN LINDE PATENT AIR CIRCULATING SYSTEM

Keeps Meat in Better Condition and for Longer Time
Than Any Other System

INSURES PURE AIR-SWEET MEAT-NO MOULD-BEST COLOR

FURTHER INFORMATION ON REQUEST

PROVISIONS AND LARD

Weekly Review

All articles under this head are quoted by the bbl., except lard, which is quoted by the cwt., in tes., pork and beef by the bbl., or tierce, and hogs by the cwt.

Big Bulges and Altogether Excited Conditions on the War News-Most Marked Advance for Pork-Largely Increased Speculation.

The products markets have been naturally under a good deal of excitement this week on the war news, with occasional soaring

Trading had calmed toward the close of the previous week, after substantial advances in prices, and up to Tuesday there had not been more than ordinary speculative activity with moderate fluctuations in prices. But with the beginning of Tuesday's trad-

ing, on the Far East news, the outside speculators came in freely as buyers, not only of hog products but of grain, while the entire sentiment was of a markedly bullish

Many speculators had gripped holdings from the previous week, and had not been shaken out by the occasional raids upon the markets as their expectations were of war trouble, with consequent rising markets; therefore, they had substantial profits when the excitement set in this week.

So far as concerns hog products a good portion of the advanced trading basis made portion of the advanced trading basis made for them in the previous week had been on ordinary yet substantial influences. More-over, it had been probable that the higher prices had been determined largely upon the exhibit of supplies and demands; the outlook was also for a good, healthy movement to consumers of the productions. All features have been accelerated through

All features have been accelerated through the generally sensitive conditions this week. It is likely that the hog products markets have entered upon a period of much activity and speculation in them, the length of which depends upon developments of the war situa-

But it is altogether probable that top prices for the near future will be reached quickly, and that from them will come more than ordinary fluctuations in frequent reactions in taking profits and general feverish-

It is claimed by a portion of the trade that the countries at war are not as a rule extensive buyers of other than canned meats and tensive ouyers of other than canned meats and beef. Nevertheless, there has been good demand recently from them for hog meats, and there was a rumor on Tuesday that a large line of pork had been bought at the West for Far East consumption; with the wild features of the market on that day, however, rumors without substance back of them were likely to expect. rumors without substance back of them were likely to appear. The rumor had it that contracts for pork had been made of volume which would nearly equal the amount of stock held at Chicago, as made with Russia and Japan, and that this was the main reason for the radical advance in pork for that day.

day.

However, Liverpool cabled the marked adnowever, Liverpool cabled the marked advance on that day of 4s. on short clear backs, with generally stronger prices for all cuts of meats, and this was an outcome of, at least, expectations of larger requirements of

hog meats.
We had for some time expressed confidence over the hog products markets, and as basing our opinions upon the steadily well sold up productions, the light weight of the hogs arriving at the packing centers, with the relatively high prices for corn as promising continued light weight livestock, and by which there would be a much less production than had been counted upon for the season, notwithstanding the very good volume of livestock back in the country. Nevertheless, we think that the markets were close to top notch prices for the near future deliveries in the trading basis of the previous week under the influences outlined, and that to send them materially higher there was needed the excitement based upon the war news.

send them materially higher there was needed the excitement based upon the war news. Of course, pork and meats have been most sensitive to the Far East news; the lard market, while having merits statistically equal to those for pork, yet has drifted to the further advance for the week more in sympathy with pork and the generally excited look of affairs.

The grain situation has occasionally borne.

cited look of affairs.

The grain zituation has occasionally borne a little against a full development of confidence in the hog products trading. The overturning of the grain markets on Monday on the pressure then of speculators, despite the then significant war news, hurt the temper of the hog products markets for that day. But on Tuesday the grain markets were carried up 10.22 per bushel for wheat and 11.4 But on Tuesday the grain markets were carried up 1@2c. per bushel for wheat and 1½ @1½c. on corn, and the hog products had free swing for all that was in them from the war news. Fork then jumped up over one dollar per barrel, lard 25 to 30 points and ribs 27 to 30 points.

On Wednesday early in the day the grain markets were up fractionally and pork then further advanced 15@20 points, with lard up 2@5 points. There were frequent changes in

further advanced 15@20 points, with lard up 2@5 points. There were frequent changes in prices subsequently through the day.

It is, of course, now impossible to get a decided line on future prices of hog products. The new element in the situation will make everything doubtful. It is quite certain that the hog products markets had favorable surroundings for the prices that prevailed before the last few days' advance, and that there was every encouragement for well supported conditions from statistical features. But with the swelling flood of



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Pure Refined Lard





ARROLL S. PAGE, HYDE PARK, VT.

en Calfskins, Country Hides, Sheep Pelts, Tallow, Bones. col Puller and Tallow Renderer Manufacturer of Page's Perfects

speculative orders this week and the likely erratic character of European news the mar-kets for awhile are likely to display a good deal of feverishness, with frequent pressure

deal of feverishness, with frequent pressure in selling to take profits.

While there is a promise of freer government orders for the hog products, yet in all probability with the wider swing of prices the home and other consumers, as well as distributors, are apt to be more conservative in taking supplies of them for accumulation. Indeed, at present the home consumers are following the higher prices of the week with a good deal of reserve.

If the war should be brought to an abrupt termination it would leave the general products markets in less satisfactory shape than

ducts markets in less satisfactory shape than that held before the recent advanced prices for them. There are now advanced prices being paid for hogs. It would have been advantageous to have kept along the healthy sentiment for both hog and products prices which prevailed among the packers, regular distributers and consumers and which was not checked at any time by a moderate advance. checked at any time by a moderate advance in the prices for both. Distributing sources

are now naturally a good deal disturbed by the current excited views over the values. Even more extensively speculators are get-ting out of cotton and into food products, since not only the big break in the prices of cotton has taken the enthusiasm out of the outsiders on that staple, as the outsider is nearly always a bull, but there is the consideration, as well, among the outsiders that food products have the advantage in war times for bullish moves and speculation. The receipts of hogs at the packing points

have not, on the whole, been up to trade ex-pectations for the week, although some days of full volume, while it has been easy to se-cure better prices for them.

The average weight of the hogs at Chicago last week was 200 lbs, the smallest since January, 1902, against 204 lbs. previous week, 208 lbs. corresponding week in 1903 and 205 lbs. in 1902.

In New York there has been a moderate export business in lard at higher prices, with sales of 1,250 tierces Western steam on p. t., of which 750 tierces western steam on p. t., of which 750 tierces by refineries, with Chicago quoted here at about \$7.90 cost and freight. City steam is quoted at about \$7.00 @7.25. Compound lard is in better demand and quoted at \$6.75 for car lots. Mess pork has a better export demand and quoted at \$15.50@16.25. Short clear ranges from \$15.25 to \$17 and family at \$15@16. City meats are in a very fair demand at stronger prices; sales of 35,000 pounds pickled bellies, 12 lbs. average, at 7%c.; 14 lbs. average, at 7%c.; pickled shoulders at 6c.; pickled hams

at 9%@10½c. Exports for the week from Atlantic ports: 2,971 bbls. pork, 10,121,020 lbs. lard, 11,987,-800 lbs. meats; corresponding week last year, 2,491 bbls. pork, 11,081,972 lbs. lard, 11,433,-558 lbs meats.

BEEF.—English shippers are taking occa-sional lots of city extra India mess at \$14.50, yet there are some brands help up to \$16.50. Barreled lots have somewhat firmer value on moderate supplies. Extra mess, \$8; packet, \$10; family, \$11@11.50.

PRODUCE EXCHANGE NOTES.

James W. Purner (Baltimore & Ohio Railroad) was proposed for membership.
New members: Abraham R. Pruden, W. E.
McCaw, Lawrence T. Ingram.
Visitors: R. L. Hughes, Liverpool; Charles
F. Garner, S. P. Richards, Liverpool; A. Hallet, Antwerp; W. Gosshing, Bremen, E. J.
Henry, C. C. Colden, William Beall, A. W.
Walker, H. O. Wells, Charles Hess, Chicago.

HIDES AND SKINS

(Shoe and Leather Reporter.) CHICAGO.

	1904.
Native steers, spready	121/2@13
Native steers, heavy	— @11
Native steers, light	- @10
Texas steers, heavy	- @111/2
Texas steers, light	- @103/4
Texas steers, ex. light	- @ 91/2
Butt-branded steers	— @10
Colorado steers	- @10
Native cows, over 55 lbs	— @10
Native cows, under 55 lbs	- @ 91/2
Branded cows	- @ 9½
Native bulls	- @ 9
Branded bulls	- @ 7¾
Pates, per 100 lbs	— @85
Trimmings, per 100 lbs	— @75
No. 1 heavy steers	- @ 91/4
No. 2 heavy steers	- @ 81/4
Side-branded steers, flat	8 @ 914
Side-branded cows, flat	71/2@ 81/4
No. 1 heavy cows	- @ 8%
No. 1 buff hides	— @ 8½
No. 1 ex. light hides	834@9
No. 2 buff hides	
Bulls, flat	- @ 7½
No. 1 calfskins	121/4@131/4
No. 1 kips	
Deacon skins, each	
Slunks, each	40 @60
Horsehides, each	3.55@3.60

Sheep Pelts.

Bucch resear			
Green salted pelts, p'ker lambs. Green salted packer sheep			
Green salted country pelts Dry pelts, Montana, butchers'			
full wooled	.12	@	121/
Dry pelts, Utah butchers' full			
wooled	.119	% (E)	12
Dry pelts, Wyoming butchers'			
full wooled	_	a	12
Dry pelts, Colorado and New			
Mexico, butchers' fair run	-	a	11
Dry flint shearlings, good stock			
Dry flint shearlings, damaged			
Dry murrains, Montanas and	_	43	-
Utahs	.12	1/2@	12%
Dry murrains, Colorados	.11	@	12
Dry murrains, Colorados	.11	@	12

BOSTON.

Dry-Selected.

California			0	۰	٠	٠					4	.21@20.	ĸ.	. 19	<u>w</u> —
Southern							۰							.13	@14
San Antor	nic)					۰	0		۰				.18	<i>a</i> —
Texas		9 1							 		. ,	.21@28.		.17	@171/2

Salted.

Brighton abattoir steers Brighton abattoir steers, b	utt-	
branded		81/4@—
Brighton abattoir cows		81/2@-
New England cows, green		6 @ 61/
New England cows, salted		8 @ 81/
New England steers, salted		9 @-

Wet Salted.

Southern				0		0			3	5	0	0	4	0		71/2	@-	_
Texas ox	and	cow					 		3(X	ã	7	10)		71/4	@-	_
Western	cows		۰		0	0										81/2	@	83/
Western	seco	nds.			0		٠	٠		0	٠		۰			75/8	@-	_
Extremes			٠						٠							9	@-	_
Extremes	, sec	onda														8	@-	_

Calfskins.

Dairy				0												55@	60
4	to	5	lbs					 			٠					75@	80
5	to	7	lbs					۰			٠		٠		. 1	90G	95
7	to	9	lbs											4	1.	20@1	.25
9	to	12	lbs					٠		٠		٠			1.	55@1	.65
12	to	16	lbs							۰	- 0		9		1.	75@1	.80
16	to	25	lbs						۰						2.	10@2	.20

NEW YORK. Selected.

City natives-60 lbs. and over@10%
City butt brands-60 lbs. and over@ 9%
City Colorados-60 lbs. and over@ 91/2
City bulls—all weights 83/4@-
City cows—all weights 9 @ 91/4
City Calfskins
5-7\$1.12\\@1.17\\\
7-9 1.421/2@1.471/2
9-12 1.671/2@1.721/4
0 12 1.01 72 @1.1272
Country Calfskins.
5-7\$1.00@1.05
7-9 1.30@1.35
9-12 1.60@1.65

ECONOMY IN FERTILIZER MATERIALS.

Now that packinghouse fertilizers are "worth money," it would seem a good time to enter into the question of utilizing everything possible, allowing no waste whatever. The great majority of packinghouses actually allow fifty per cent of their fertilizer account to find its way to the sewer, which statement in this age of keen competition and consequent utilization of every possible by-product seems incredible. But it is a fact, nevertheless.

Figuring on a hog basis: Ordinarily hogs will yield about 71/2 lbs. of dried blood and tankage and 21/2 lbs. of finished concentrated tankage per hog. The former will analyze about 9% ammonia and 20% bone phosphate, which at present figures is worth about \$21.00 per ton. The latter will analyze 15.50% of ammonia, at \$2.25 per unit, or \$35.00 per ton. Eight hundred hogs would yield of regular tankage about 3 tons, which at \$21.00 per ton amounts to \$63.00, and of concentrated tankage one ton at \$2.25 per unit of 15.50 is \$35.00, so the foregoing statement that the great majority of packers lose one-half of their fertilizer account annually by allowing tankwater to escape to the sewer is more than proved.

Now, if tankage, blood and concentrated tankage is mixed and properly manipulated, it should analyze 11% ammonia and 18% bone phosphate, which at \$2.25 and 10c. would amount to \$26.55 per ton, or a total of 4 tons at \$26.55, or \$106.00. The cost of manufacturing concentrated tankage is about one and one-quarter cent per hog. We should be pleased to hear from some expert on this subject-figures to be given on a basis of say 500 to 1,500 hogs per day. Few houses sepa-500 to 1,500 hogs per day. Few houses keep blood, tankage and concentrated separate, consequently figures on all separate and also combined would be interesting.

FAT INSPECTION FEES IN GERMANY.

The board of trade at Krefeld, Germany, is in receipt of a communication from margarine manufacturers, complaining of the exorbitant inspection fees levied on foreign fats used in their factories. It is stated that some \$50,000 is expended annually for this purpose, which it is claimed is a wholly unnecessary charge.

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if you don't use "EUREKA" It's the Packing that helps the engine to do full work-at one half usual cost. Genuine " Eureka" Indicators. Steam Separators. Feed Water Heaters.

204 Fulton Street, NEW YORK. JAS. L. ROBERTSON & SONS., - -

TALLOW, STEARINE, GREASE and SOAP

Weekly Review

TALLOW .- There has not been permitted, this week, much of a business in New York city hogshead tallow because the supplies to be had for the remainder of February delivery a narrow order.

But in a general way, as covering out of town made tallow, and as offered in New York, with the grades of it that have been at interior markets, there has been more vitality to affairs.

On the whole the situation is a strong one. However, much less than ordinarily our home compound lard makers are using edible grades of tallow, and because in part of am-ple supplies of oleo stearine at reasonable prices, and, as well, on account of the loss in volume trading in compound lard, yet the foreign markets are using the edible tallow to a very fair extent, and the supplies of it in this country are not largely accumulating.

It is the soap trade upon which the tallow markets depend chiefly for absorption of the supplies upon them, and we can see no reason material abatement of the late activity in them, except as supplies become reduced.

The tallow trading has exceptional features this winter season, and which may be prolonged for weeks in the necessary larger consump-tion of the beef fat by reason of the moderate supplies and market situations of some other fats. There are a sufficient number of the soapmakers who believe that the beef fat mar-ket positions warrant a little confidence on their part to take up the supplies of the tal-low at around current prices. The reports are that some of these people are accumulat-ing the tallow, therefore that their demands must ultimately diminish. But since this buying has been going on for a long time in rather full volume, it is a fair inference that the tallow is being as well freely used promptly as well for consumption. Indeed it would be hard to understand why with a very good soap business over the country, the moderate supplies of cotton oil and palm oil with their high prices, why there is not an actual ne-cessity for a larger than ordinarily consump-

The entire tallow position would, as well, be encouraged by the developments in the lard market, which latter has shown a sharp

advance this week.

There is little prospect of material export demand for the tallow, outside of the edible grades of it, since there are rather better supplies of other soap materials upon the Conti-nental markets, and which will soon be con-

siderable importance.

The London sale on Wednesday showed 3d. decline for beef and mutton, with 300 casks sold out of 600 casks offered.

Edible tallow in New York is quoted at 5½@5%c. for city.
Country made is fairly well taken up to its offerings here and at strong prices; sales of 280,000 lbs, in lots at 5@5%c., as to quality.

New York has not sold, up to this writing, this week, city hogsheads, but quotes 5c. bid, and the price will be undetermined until the next sale

The Western markets are well supported, with a good amount of trading, especially on the part of one soap house, At Chicago prime packers quoted at 51/2@5%c. and city 8@51/4 c.

OLEO STEARINE.—There is no question but that the compound lard business is improving; therefore, that the consumption of the stearine has in that degree enlarged. But the compound makers are carrying fair sup-plies of the stearine and are not urged to

further large buying of it.

The firmer prices held for the present are not promptly met, and it requires a little longer period to determine the strength of the position. The pressers are especially confident on the lard position in the belief that through it the compound lard trading will materially increase. Quotation, 6%c.

Sales of 200,000 pounds in New York at 6%, 100,000 pounds in Kansas City at 6%, and 500 000 pounds in Chicago at 6% closing

 $6\%,\ 100,000$ pounds in Kansas City at 6%, and 500,000 pounds in Chicago at 6%, closing at 6% in Chicago.

LARD STEARINE .- Little more of an ofrering of out of town made, and not much demand. Refined lard people turn out about enough for their wants. Quotations, 81%@81½c.
OLEO OIL.—Rotterdam seems to use up

fairly well its importations and holds the late prices of 45 florins. In this country consumption is fairly good. New York quotes choice 8¼.. prime, 6¾c., low grade, 5½c. GREASE.—English demands are somewhat

GREASE.—English demands are somewhat better for the low grades. Our local soapmakers buy a little more freely. Pressers not doing much. Yellow, 4½@4½c.; bone and house, 4½@4½c.; "B" white, 5c.; fine white,

GREASE STEARINE .- Supplies on offer not excessive. Moderate export Yellow, 4%@5c.; white, 5%@5%c.

CORN OIL.--Foreign markets are using the oil much more freely on account of the relative greater strength of some other fats, and our home trade in it has improved. Market strong at \$4.05@4.25 for large and small lots, from first hand, but some resales made latterly at \$4.

PALM OIL.-Little doing here because of the scarcity of the product and the full prices. situation, however, is a confident both in Europe and this country. Red, 61/4@ 6%c.; Lagos, 6%c

COCOANUT OIL.—Selling interests continue having an advantage, with a fairly good consumption and the situation of supplies. Ceylon, spot, 61/2/06/4c.; February to April shipments, \$5.871/2/06; January to March shipments at 6c.; Cochin, spot, 61/2@63/4c.;

n, shipments, 64@6%c. NEATSFOOT OIL.—Market fairly well supported on small jobbing sales, because of ***************************************

moderate stocks. 20 cold test, 97@98c.; 30 cold test, 85@86c.; 40 cold test, 67c.; prime, 52@54c.; dark, 46c.
COTTONSEED STEARINE. — Produc-

tions are closely taken up at strong prices. Quoted at 5@5%c. per lb.

LARD OIL.—Market stronger on the situation of the lard market, and with a fair number of jobbing sales. Prime quoted 62

SHEARING OF WORLD'S FAIR SHEEP.

A rule having an important bearing upon the shearing of sheep to be exhibited at the World's Fair at St. Louis, has been announced by Chief F. D. Coburn of the Department of Live Stock as follows:

"All sheep and goats must have been evenly, closely and properly shorn on or after the first day of April, 1904, and the date of the shearing must be certified on the application for entry. Sheep or goats unevenly or stubble shorn, or that have been clipped to conceal defects or to mislead will not be allowed to compete. The judge shall disqualify for competition any sheep or goat deemed by him as having been improperly or stubble shorn or with its fleece otherwise treated for purposes of fraud or deception."

The question of shearing in connection with the exhibition of sheep has been a vexed one at fairs and expositions for a long time. Chief Coburn has gone into its details with a great deal of care and with the determination that the same high standard set elsewhere in the World's Fair prize list should prevail in this regard. A draft of a rule was sent to prominent breeders and authorities with the request for suggestions as to the best form. The customs prevailing in other countries made legitimate through climatic or other conditions, although perhaps not common with sheep bredeers in the United States, have been fully taken into account. The experiences of previous fairs and the necessity of avoiding an unenforceable regulation were considered. The rule determined upon is intended to enforce only such restrictions as will secure deserved awards.

CLASSED AS COTTONSEED OIL.

A recent importation of oil purporting to be olive oil was classified and duty imposed as olive oil. It having been determined that it was a mixture of olive and cottonseed oil, the appraisal was altered by the general board, and the cottonseed oil duty imposed.

Prime Green Olive Oil Foots

UNCLE SAM BRAND

QUALITY, THE SUPREME TEST

They cost a little more than ordinary Foots but if you buy "UNCLE SAM BRAND" you will be so pleased with the results that you will forget the price and always remember the quality

Welch, Holme & Clark Co.,

383 WEST STREET **New York City**

MACA

COTTONSEED OIL

Weekly Review

THE NATIONAL PROVISIONER is an official organ of the Interstate Cottonseed Crushers' Asso-ciation, and the official organ of the Oil Mills SuperIntendents' Association of the United States.

Steady Hardening Markets at the Mills-Increasing Consumption-Still Moderate Productions-Seaboard Markets a Little

The market has been working steadily to a stronger basis at the producing points, but has become tame at the seaboard. For instance, crude in tanks has been sold at the southeast mills at an advance to 32, and rumors at 32½, while New York, at this writing, has settled to sales at 38 for prime yellow for February, with April at 39 bid and 39½c. asked, and May at 40c. asked after May had been 39¾ bid.

The seaboard markets are affected, tempo-

The seaboard markets are affected, temporarily at least, by the steady re-selling of cotton oil contracts by Europe, which names lower prices for the oil than the lay down cost of it from this country; as well, however, they are influenced by the fact that they are certain; little dward by converting they are getting little demand, by comparison with that at the mills. The demand at the mills is in the interest of the more prominent companies and the compound makers.

The position has been influenced at the mills in the increased demands from the compound makers, but the shearly higher leads

pound makers by the sharply higher lard prices, through which latter feature there is a fair prospect of even freer demands for the compounds and consequent increased consumption of the oil.

The late big break in the prices of cotton, and no matter what may be the extent of the cotton crop, the fact remains that the mills cannot as yet get the seed supplies in at all free volume, and that the production of oil although some increased runs in a re stricted way.

The supposition of some of the mills that there is enough seed in some localities to meet needs of it, and that they will ultimately get it, still waits time to show facts

concerning it.

There had been an impression with some of the mill people that with the smash in the prices of cotton that the bullish sentiment among planters over seed prices would be subdued; thus far, however, the planters

show as much indifference over selling the seed as at any time in the season.

The "seed must be there" is heard frequently among the mill people, and it would seem as though, in some States at least, a considerable quantity of seed could still be

had, however more largely than ever before the seed has been, and will be used by the planters themselves.

But for the season thus far very moderate oil production and the now rather generally conceded loss of oil production for the year of about 500,000 barrels gives sellers the advantage.

It is now possible that pure lard will stand high enough in value to permit, at length, decidedly better prices for the compounds and by which the compound makers could afford the possibly stronger prices for cotton

Our opinion has been that the pure lard market was likely to favor sellers, with a moderate advance in the prices for it, from the basis of supplies and demands. But with the developments this week of the Far East trouble excitement has naturally come about in the hog products markets and substantial further advances have been made in the prices of lard, while there is a possibility of prolonged speculative excitement which may bring about somewhat erratic figures for the

It is to be regretted that the oil produc tion is to be a moderate one this season in view of the lard position, and the fact that the oil would have been freely consumed this year at reasonable prices. As it is the production is likely to be closely bought up at prices in the seller's favor, even though the foreign markets continue through the season indifferent over buying it, and notwithstanding the present tameness through the reselling of the oil by the foreigners. The fact that there is a war in Europe does not, of course, have a bearing upon lard prices direct, course, have a bearing upon lard prices direct, but it does mean that hog meats are more freely bought and that lard sympathizes with the trend otherwise of the hog products markets. Moreover, the speculator is always aroused over food products with war trouble anywhere; he has been in evidence this week. While pure lard has been closely consumed to its production thus far this winter reaching season; it is by no means certain.

packing season, it is by no means certain that it will be closely taken up at prices that may come about from the bent of speculation in the hog products. Some outside prices on the war news may not be shaken for the lard, yet there is little question but that the compounds would be freely substi-tuted for the pure lard in the event of furmaterially stimulated prices for the pure lard.

At present, while the compounds are at 6% for car lots, although they are likely to be stronger on account of the rise this week in the prices of the pure lard, and that they are in strong contrast with those of the lard market, yet they are closer than in most seasons with the prices of pure lard. It is because of the fact that the compounds are not, as yet, in active demand and that the compound makers would like to have an even more material difference in their prices with the pure lard that the compound prices with the pure lard that the compound makers go slow in making the prices of the compounds correspond with the increased of the cotton oil,

cost of the cotton oil.

If it had been possible to have had this year a good, full production of cotton oil with ordinary prices for it, there would have been probably as large a business in compound lard as had last year, which was then of exceptional volume, and as closely sold up supplies of the oil as in the previous season. This is seemingly so from the current developments of the pure lard market, and from the fact that the hog supplies of the country are being poorly fed this year the country are being poorly fed this year because of the much more satisfactory prices of corn to farmers than those for hogs, and by which the lard prices are in part in-fluenced in favor of sellers and which would even more largely have benefited trading in compounds and absorbed the cotton oil sup-

As it it, the compound lard is taking more

As it it, the compound lard is taking more attention than it had a few weeks since, and the probable growth of the compound lard business makes it doubtful that the supply of the cotton oil will be at all burdensome.

The South has made a few inquiries for refined oil at the seaboard at prices quoted for it this week, while it is selling its crude, in instances at the better prices for it rather than hold it against loss of quality. We bear of a small lot of off grade on offer heard of a small lot of off grade on offer

this week.

It has been an exceptional season in respect of off grade oil, since it has been almost impossible to find other than prime quality on offer. Indeed, if there had been off grades of oil an ordinary supply of the off grades of oil the soapmakers would have been much more material buyers in the oil market.

But where the mills are selling their crude is only in lots of a tank or two and for prompt delivery; none of them care to sell

The refining loss is this year very light on account of the superior quality of the

seed.

It is thought that the refining loss in the previous year was from 12 to 15 per cent; that is, in the last season that 2,500,000 barrels crude were produced, and that the outturn of refined then was not more than 2,200,000 barrels, although there are other opinions that it reached close to 2,300,000 barrels. barrels.

The less proportion of seed obtained this

KENTUCKY REFINING CO.

LOUISVILLE, KENTUCKY, U. S. A.

MANUFACTURERS AND REFINERS COTTONSEED OIL

"SNOWFLAKE"

A CHOICE WHITE OIL FOR BAKING, FRYING AND COOKING

Southern Cotton Oil Company

Head Office: 11 Broadway, New York

Cable Address, "Scototice," New York.

Mills and Refineries in Georgia, North and South Carolina, Alabama, Tennessee, Arkansas, Leuisiana and Texas.

anufacturers of all Cotton Seed Products

Oil Cake and Meal, Hulls, Linters, Soap Stock and Soap. Refiners of Cotton Oil, all Grades.

Manufacturers of Lard Compounds.

REFINERIES LOCATED AT Savannah, Augusta and Atlanta, Ga.; Charlesten, S. C.; Charlotte, N. C., Montgomery, Ala.;
Heuston, Tex.; New Orleans, La.; Memphis, Tenn., and Little Reck, Ark.

year is arranged, in consideration, alongside of the feature that the refining loss now is less than that of last year, and that if the concession is made of 500,000 barrels less oil made this year it does not mean, in proportion, so much less refined.

But, in our opinion, unless there are bet-ter prospects of obtaining seed supplies than those at present there will be at least that much less refined oil to be had for consump-

The few "shorts" on oil were scared at the close of the previous week and covered at the close of the previous week and covered their contracts. Some of these "shorts" had a paper profit a few weeks since; necessarily they were at a disadvantage on the late developments.

Outside of this little demand to cover contracts, together with the small demand from the South for the refined to hold as against their sales of crude, and a moderate starting up of demand from the compound makers for bleaching oils, there has not been much doing

in the seaboard markets.

All consumers have been buying conservatively, since while feeling that the statistical position does not warrant expectations of other than strong prices, yet they are loth to buy beyond actual needs, as realizing that their profits now are too narrow on the manufactured goods to take the chances of stocking up freely with the raw materials at their strong cost.

The export situation is not changed. The

The export situation is not changed. The European markets continue buying the edible oils moderately, or as they can use them promptly. There is no hope of material demand thence for the soap grades, the business in which thus far this season has been materially less than that of last year, while last year it was much under ordinary volume. It would seem likely that full, free buying of cotton oil by Europe could only be had again when market prices here for it get

upon a competing basis with the other soap oils of Europe.

This year there would seem to be plenty of these other oils and at reasonable prices; because of this cotton oil not only suffers because of this cotton oil not only suffers but some other soap materials in volume of export business in this country. Thus while the tallow market is firm it is so wholly from our home soap makers' demands, which have been large and general, and not in any sense from export demand, while a couple of months since, before the season for arrival of the soap making oils in Europe, the de-mand for tallow thence upon our markets were the main reason for the firmness in prices here.

The New York market has sold 1,200 bbls, prime yellow, February delivery, at 38@, 38½c., now at 38c.; 1,500 bbls. do., March, at 38½ @38¾c., chiefly at 38½c., now 38½c. bid and 39e. asked; April at 39e. bid and 39½c. asked; 700 bbls. do. May, in lots, at



CAKE. LINTERS. ASHES. SEUNION OF 2 BUTTER : * PURE SALAD OIL NO

AMERICAN COTTON - OIL 27 Beaver Street, New York City



39½c.@39½c., now 39½c. bid and 40c. asked; winter yellow 42@43c.; white, at 41@42c.; 25 tanks crude, at the mills, at 31½@32c. Texas now asks to 31c. for crude.

Later.—The New York market has had fur-

Later.—The New York market has had further sales of 800 bbls. prime yellow, Feb. at 38, with, for May, 40 asked and 39 bid; winter yellow has been advanced to 43, for small lots, and white to 42.

TEXAS COTTONSEED OIL MARKET.

Reported for The National Provisioner by the Texas Cottohseed Crushers' Association.

The Texas oil market the past few days has developed strength and activity, with sales of about all the oil the mills will let go at 30c., which was in a limited way, and they are now holding for an advance.

Meal firm at \$22.75@\$23.00 per short ton for export f. o. b. Galveston.

Linters and hulls very scarce, with little of either to offer at unchanged prices.

No good seed offering.

NEW PALM OIL EXTRACTING MACHINE.

A German colonial government committee recently offered a prize for an efficient machine for extracting palm oil. German manufacturers have taken part in this competition, and the prize has been adjudged to a Berlin firm of machine manufacturers named Haake. By means of the Haake machine the yield of oil is more than doubled. The nuts contain on an average 22 per cent. of oil. It is said that under native methods only 7 per cent. of this is collected; by means of the new machine the yield is increased to 15 or 18 per cent.

ICE AND REFRIGERATION

(Continued from page 29.)

day, and the effects of the weather were felt. Extras sold at 34c. and firsts 33c. Receipts for the week were 7,451 cases as compared with 7,824 for the previous week. The refrigerator stock is about exhausted.

In Philadelphia the market was steady the first of the week. Nearby sold at 30c. at mark, and the same figures were quoted for Western and Southwestern. Southern eggs sold at 29c. at mark.

In Chicago the market was steady. Extras were quoted at 33c., firsts 31½c.

NOTES OF THE CREAMERIES.

Beatrice Creamery Company, Lincoln, Neb., has bought out the Nebraska-Iowa Creamery Company, Sioux City, Ia., which has a production of 3,000,000 pounds of butter annually.

Hazelwood Creamery Company, of Sioux City, Ia., has reorganized with \$250,000 capital and will transfer its business to Portland, Ore., where an up-to-date plant will be erected.

A dairy school will be opened in Pullman, Oregon. The necessary plant and equipment will be erected.

Co-operative dairying is directly responsible for an increase in the value of Danish butter exports from about \$5,000,000 to over \$20,000,000. The first Danish co-operative dairy dates from 1882. Now there are 1,057 co-operative dairies in Denmark, comprising some 140,000 members, and receiving milk from 850,000 cows, or more than four-fifths of the total number of cows. The average price received for butter is 23.3 cents a pound.

The new plant of the Littleton Creamery Co., Denver, Colo., is to be completed in March. The building will be 100x125 feet, five stories high. The office and salesrooms will be on the ground floor. The second story is to be used as the egg candling department, and on the third and fourth floors will be located the cold storage rooms. In the front of the basement will be the churn room, which will be lined with white glazed tile.

NOVEL USE OF REFRIGERATION.

The Union Electric Co.'s big plant at Ashley and Lewis streets, St. Louis, has been saved from serious damage by the laying of ammonia refrigerating pipes around a cofferdam which had sprung a leak. The cofferdam, one of three designed to protect the

workmen who are constructing concrete walls in a new powerhouse excavation on the river front, broke apart in one place and the river poured through.

This continued for several days and heavy loss seemed certain. Nothing could be done to draw together the two 50-foot steel piles which had sprung. Then the mechanical engineer of a refrigerating plant two blocks away was called in. He saw an opportunity and laid ammonia pipes from the refrigerating plant to the place of the leak. The leak was soon closed with solid ice, the water which had flooded through the dam was pumped out and work was resumed.

Lombard Iron Works & Supply Company,

Builders and Dealers in ENGINES, BOILERS, Tanks, Stacks, Standpipes, etc.; Bridge and Architectural Iron Work; Railroad, Cettes, Saw, Fertilizer, Oil and Ice MACHINERY and Supplies and Repairs; Shafting, Pulleys, Hangurs, Leather and Rubber Belting and Hose; MILL SUPPLIES and TOOLS; Foundry, Machine, Boiler and Bridge Work. Capacity for 300 hands.

ASPEGREN & CO.,

Produce Exchange, NEW YORK.

Commission Merchants.

EXPORTERS

Cotton Oil, Tallow and Greases.

The Procter @ Gamble Co.

Refiners of All Grades of

COTTONSEED OIL

Aurora, Prime Summer Yellow Boreas, Prime Winter Yellow Venus. Prime Summer White

Cable Address
Procter, Cincinnati, U.S.A.

Marigold Cooking Oil
Puritan Salad Oil
Jersey Butter Oil

Office: CINCINNATI, O.
Refinery: IVORYDALE, O.

MONTHLY STOCK YARDS REPORTS

Following are reports of the comparative receipts and shipments of live stock at the various centres for the months ending January 31, 1904, and January 31, 1903, as computed by the officials of the stock yards companies:

	CHICA	GO				T. PAU	JL	
	Receipt	ts.				Receipts		
	Cattle. 1904293,300 1903275,388	Hogs. 869,814 817,586	Sheep. 355,926 361.049		1904 1903		Hogs. 120,397 95,398	Sheep. 114,713 65,928
			ourjess.	Shipments.				
	Shipmer	ats.		Jan.	1904	6,668	17.545	77.586
	1904111,409	159,542	63,110 -		1903		5,809	40,806
Jan.	1903 95,221	108,331	23,632		Const	med in S	t. Paul.	
	Consumed in	Chicago.		Jan.	1904	6.911	102.852	37,127
Jan.	1904181.891	710,272	292,816		1903		89,589	25,122
A	1903180,167 verage weight of ho lbs., 1903, 208 lbs.	709,255 gs for mor	337,417 nth, 1904,		erage weigh		, 1904, 202	

KANSAS CITY

	Receipt	8.	
	Cattle.	Hogs.	Sheep.
Jan.,	1904169,527	194,260	82,432
Jan.,	1903159,769	160,864	68,957
	Shipmen	its.	
Jan.,	1904 70,516	3,335	5,093
Jan.,	1903 63,528		8,372
	Continued in Ka	nsas City.	

	Con	tinuec	i in	Kansa	s City.		
Jan.	1904.		92,99	1 1	89,941		75,960
Jan.,	1903.		96,75	0 1	62,507	1	59,299
Av	erage	weigh	at of	hogs,	1904,	222	lbs.;
1903.	224 1	ba.					

OMAHA

		Receipt	S.	
	1904 1903		Hogs. 184,588 197,433	Sheep. 155,501 98,379
		Shipmen	ts.	
Jan., Jan.,	1904 1903		468 970	38,376 14,581

	Consume	d in	South	Omah	a.	
Jan.,	1904	54,88	5 1	84,237	11	3,818
Jan.,	1903	65,720	6 1	96,405	8	32,352
	erage weigh	at of	hogs,	1904,	250	lbs.;
1903,	242 lbs.					

ST. JOSEPH Receipts.

		Cattle.	Hogs.	Sheep.
Jan.,	1904	48,925	148,335	39,077
Jan.,	1903	42,673	138,797	39,778
		Shipmer	its.	
Jan.,	1904	4,954	455	2,378
Jan.,	1903	4,254	28	3,700
	Consu	med in S	t. Joseph.	
Jan.,	1904	32,561	146,028	34,017
Jan.,	1903	33,529	138,867	35,128
Av	erage weigh	ht of he	gs, 1904,	221 lbs.;
1903	233 lbs.			

SIOUX CITY

		Recei	pts.		
	1904 1903		104,955	SI	1,398 3,703
		Shipm	ents.		
	1904 1903				1,368 1,747
	Consu	ned in	Sioux City.		
Jan.,	1904 1903 erage weigl 217 lbs,	6,806			178 2,025 lbs.;

			_		
		DENVE	R		
		Receipt	s.		
Jan., Jan.,	1904 1903		Hogs. 22,391 10,765	Sheep. 13,007 26,750	
Jan.,	1904	Shipmen 10,213	ts. 571	6,412	

		Shipmer	nts.	
	1904 1903		571 266	6,415 17,66
	Cons	umed in	Denver.	
Jan.,	1904	3,993	21,820	6,598

STOCKS OF PROVISIONS.

Stocks of provisions in South St. Joseph, Mo., at close of business January 30, 1904, as reported to the "Stock Yards Daily Journal," were as follows:

	1904.	1903.
Mess pork (new) made since Oct. 1, 1902		
bbls.	10	
Other kind of barreled pork, bbls		1,286
P. S. lard in storage tanks and tierces made since Oct. 1		
1903, tes	3,913	789
Other kinds of lard, tes. Short rib middles and	. 277	967
rough or back bone- short rib middles made		
since Oct. 1, 1903, lbs	. 1,603,959	1,380,498

Short rib middles and		
rough or back bone-		
short rib middles made		
previous to Oct. 1,		
1903, lbs		8,378
Short clear middles, lbs.	419,743	971,973
Extra short clear mid-		
dles made since Oct. 1,		
1903, lbs	1,910,764	1,985,100
Extra short rib middles,	***	
lbs	692,625	1,560,910
Long clear middles, lbs.	161,664	
Dry salt shoulders, lbs	548,670	393,961
Sweet pickled hams, lbs.	5,787,406	8,241,615
Sweet pickled shoulders,		
lbs	145,050	1,046,755
Dry salted bellies, lbs	1,641,245	1,473,610
Sweet pickled bellies,		
lbs	2,323,943	2,264,906
Sweet pickled California		
or picnic hams, lbs	762,550	1,313,096
Sweet pickled Boston		
shoulders, lbs	155,450	682,820
Sweet pickled skinned		
hams, lbs		2,379,680
Other cuts of meats,		
lbs	2,087,695	2,678,640
Total wgt, cut meats 19	0.842.564	26,371,944

Live Hogs.

	Jan., 1903.	Jan., 1903
Received	 . 148,385	138,797
Shipped	 . 1,934	286
Driven out		139,149
Average weight, lbs.	 . 218	232

MODIFIED CUBAN LARD ORDER.

The United States Consular representative at Havana reports that the chief of the Health Department of Cuba has agreed to recommend that compound lard imported into Cuba shall bear the words "manteca artificial" (artificial lard) on each package, roll, or vessel containing such material, and that he furthermore stated that no objection would be made to the use of the English words "compound lard" on the package, roll or vessel; provided, always, that the Spanish lettering be of the same size as the English. This is a modification of the original recommendation that compound lard imported should bear upon the package the words "no es manteca de cerdo" (not hog's lard).







CHICAGO SECTIO



Michael Cudahy is at present in California and is expected to remain there for several months. H. L. Kreider, of the Cudahy Packing Company, of South Omaha, was at the Chicago office during the week.

Arthur F. Evans, attorney for Swift & Company, was in Washington in the interests of the firm during the early part of the

George J. Brine, of Armour & Company, has returned to his desk, somewhat improved in health.

Both Messrs. Merritt and Wardrup, of Armour & Co., returned from the East after a short stay and are actively engaged in promoting the publicity and sale of the "Verihest."

Libby, McNeill & Libby have added chop suey (the orthography is theirs) to their 120 specialties, so that this favorite Chinese dish is one of the 121. Practically all the product of Libby, McNeill & Libby is packed in key cans, the keys for which are furnished by the American Key Can Company, Marquette Building, Chicago.

Advices from Washington state that the Macumber bill will, in all probability, supersede the Hepburn bill.

The Orange Judd Farmer estimated the amount of live stock on hand in the United States January 1, 1904, as follows: 71,373,-000 cattle, including 19,428,000 milch cows; 50,464,000 hogs; 42,761,000 sheep. Compared crease of 299,000 milch cows and 414,000 per bushel; gluten feed, \$22 per ton; cotton-"other" cattle; hogs increased 1,547,000; seed meal, \$25 per ton; linseed, \$26 per ton. sheep, 307,000.

The new rendering plant district, as recommended to the health department committee by Aldermen Alling and Sloan, is bounded by a line run with the avowed intention of not interfering with established plants. The point of departure is the Omaha Packing Company's plant, at Halsted and O'Neill streets, and to that point the boundary line returns, having encircled sixteen rendering plants. Following is the course one would take in traveling around the new district: of 1902-3 and were in too good condition at Omaha Packing Company, O'Neill street, "slip A" West Twenty-second street, Blue Island avenue, Western avenue, west fork of the south branch of the river, Pittsburg, Fort Wayne and Chicago Railway, Twenty-eighth street, Western avenue, Illinois and Michigan Canal, Hoyne avenue extended, Thirty-second street, Seeley avenue, Thirty-third street, Robey street, Thirty-first street, south branch of the south branch of the river, west branch of the south branch of the south branch of the river, Thirty-ninth street, Paulina street, Forty-third street, Ashland avenue, Forty-fifth street, Loomis street, Forty-seventh street, Halsted street, Root street, Lowe avenue, Thirty-ninth street, Center avenue, Thirtythird street, Fox street, Thirty-first street, Pitney court, Archer avenue, Chicago river and Illinois and Michigan canal, Halsted street, Omaha Packing Company.

"I do not think we have left any out, except Stern & Co," Alderman Sloan said. "They fought the city. The district is all right as recommended. We shall have a little smell in Chicago as long as we have a city council."

Leading Packers

through their alert Purchasing Agents Buy SUPPLIES Here

WHY NOT YOU?

Woodenware Packages Paper Salt Pails Skewers Fuller's Earth, &c.



35 So. Water St., Chicago

CATTLE FEEDING TESTS.

One of the most carefully planned and extensive tests in feeding beef cattle for market has recently been concluded at the Missouri State Experiment Station. The chief object was to determine the relative value of various forage crops fed in combination with corn and other grain. The 28 head of cattle which were marketed on Wednesday of last week were placed on full feed May 1, 1903. At that time they were 12 to 14 months old. They were divided into four lots; seven head in each lot, and all placed on good bluegrass pasture. Lot No. 1 was fed a ration of corn and linseed meal. Lot 2 corn and cottonseed meal. Lot 3 corn and gluten feed. In each of these rations the grains were in the proportion of three parts corn to one part nitrogeneous concentrates. Lot 4 was fed shelled corn exclusively.

The general results appear in the table herewith. The prices of grain in the experi-

with a year ago, these figures show an in- ment are estimated as follows: Corn, 40c.

Lot. Kind of grain. Daily gain	Grain per pound of gain	Cost of grain per lb, of gain.
1. Corn and linseed		
meal2.54	7.22	6.20c.
2. Corn and cotton-		
seed meal2.34	7.12	6.03e
3. Corn and gluten		
feed2.30	7.51	6.08c
4. Corn alone2.20	7.41	5.29e
n com monerman		0.200

The calves were well fed during the winter the beginning of the experiment to make the most economical gains,

It will be seen from the table that Lot 1 receiving corn and linseed meal made the largest gains, but these were the most costly of all. The smallest gains were made by Lot 4 on an exclusive corn ration, but these gains were the most economic.

At the time the cattle were sold, the lots receiving linseed and cottonseed meal were still making good gains. The lot on corn alone had apparently reached the limit of profitable gains several weeks before those receiving nitrogenous supplements.

-4 A GREAT YEAR'S GROWTH.

The annual report of the Agar Packing Company, of Des Moines, Ia., for 1903, shows an increase of 64 per cent, in sales and an increase of over one hundred thousand in

ALLBRIGHT-NELL CO., 4013 Wentworth Avenue WEIR & CRAIG MFG. CO., 2421 Wallace Street Chicago Special Agents Hurford's Hog Hoist



Ā Germany. 26-28 for 3 Supply and South Butchers' S bertstrasse,

the number of hogs slaughtered. The company will enlarge its territory during the coming year. All the old officers have been re-elected for the ensuing year. A dividend of 8 per cent. was declared to stockholders. The itemized report of the business for 1902 and 1002 follow

WING TOOO TONOMS.		
	1902.	1903.
Sales	2,112,954.15	\$3,468,412.71
Livestock pur-		
chased	1,698,834.72	2,975,598.69
Number of hogs		
slaughtered	104,275	205,547
Weight of hogs	24,118,150	49,925,027
Wages paid Des		
Moines labor	67,267.49	133,498.92

BLOW TO SMALL SLAUGHTERERS.

The smaller slaughterers are likely to receive a heavier blow than that at any time dealt them by the bigger concerns in the competition of trade. There is a movement started to force inspection of the meats killed by the little fellows as well as the big ones. If such inspection is insisted upon it will succeed in closing many of the so-called independent abattoirs.

The experiment is being tried in Missouri. The city inspectors of Kansas City, Mo., have notified the meat dealers that no uninspected meats will be allowed to be sold in the butcher shops. The result has been the closing of some of the small abattoirs because there are not enough U. S. Government inspectors allowed in that field to provide for inspection in all the small slaughter houses. Among those affected by this new order are: Adler & Co., Moffatt & Dennis, Gregg & Hartman, Cochrane & Co., Kaiser & McLaughlin. Only Adler's and Cochrane's plants had secured government inspection up to last week.

Inspector James W. Strode's order has fallen like a bomb among the smaller concerns. If a national law forced the government inspection of all meats killed and sold for human consumption it would fall heavily upon the little fellows throughout the country. Yet there is some ground for such a law, in view of the conservatism of the public health.

GOVERNMENT MEAT STATISTICS.

The annual summary of domestic trade movements for 1903, as reported by the Department of Commerce and Labor through its Bureau of Statistics, indicates that the distinctive feature of the livestock trade at interior markets was the lowering trend of prices compared with those of 1902. At the end of 1902 hogs averaged \$6.28 per hundred

pounds at Chicago, compared with \$4.50 in 1903, says the report, in spite of a reduction in annual supply at five markets, from 18, 763,104 head in 1901, to 15,614,139 head in 1902 and 15,014,811 head in 1903. Beef cattle prices fell from \$6.75, the annual average of 1902, to \$4.90 in 1903, the report states, with receipts at four markets increasing from 7,244,467 head in 1901 to 7,710,559 head in 1902 and 8.326,088 head in 1903.

The grand total of livestock received at the five markets - Chicago, Kansas City, Omaha, St. Louis and St. Joseph-was 32,-983,601 head in 1903, in contrast with 32,-673,286 head in 1902, and 34,143,776 head in 1901. Provision stocks of cut meats on December 31, 1903, were 147,028,951 pounds against 178,616,100 pounds a year before at five markets reporting.

BAD GOVERNMENT GUESSERS.

"It now transpires that the cattle feeder was badly fooled by the government crop report on corn," says the "Livestock World." That report was calculated to create an impression that there would be ample grain for all domestic purposes and abundance for export, if none to burn. The feeder, reading between the lines, saw visions of 20 to 30-cent feed. Stockers were cheap, and he filled his feed lot, all the time placing implicit confidence in the aforesaid government re-

ort.

"But that unveracious document has in many instances proved his undoing. Instead of 25 to 30-cent corn, he is paying 40 to 45 cents, hence his haste to liquidate. This has thrown thousands of cattle on the market, prematurely, and will do so for some time to come. The moral? Here it is: Put not your faith in government reports."

A CIVIL SERVICE ABATTOIR

A CIVIL SERVICE ABATTOIR.

A Kansas City alderman has a plan to put the big packing concerns out of business and enable consumers to get cheap meat. He has introduced an ordinance in the city council for the establishment of a municipal abattoir. The city is to purchase the ground, erect the buildings and establish the plant, adopt a set of rules and rates of charge, and hire a set of slaughter house employes, who are to be under civil service rules. This is are to be under civil service rules. This is a variation from the prevalent independent, co-operative fad, and if it could be put into operation it would certainly prove a great thing for the butchers affiliated with the party in power in municipal affairs, not to mention the unlimited "meat graft" possibilities for politicing. bilities for politicians.

HOGS' LIVERS A NEW DELICACY.

Hogs' livers are now being used as substitutes for goose livers in the manufacture of pate de foi gras, and according to Dr. Harvey W. Wiley, Chief of the Bureau of Chemistry of the Department of Agriculture, the substitution can be detected only by microscopic examination. He declared that

hogs' livers were shipped from this country abroad and returned to the United States in the shape of pate. Much of the pate, he said is totally innocent of goose livers.

CHICAGO HOG PURCHASES.

For the week ending February 6, 19	904:
Anglo-American	
Armour & Co	
Boore & Co	
Boyd & Lunham	
Continental Co	4.100
Morris & Co	
National Packing Co. (Hammond Co.)	5,500
Roberts & Oake	
Schwarzschild & Sulberger Co	
Swift & Co	
City butchers	
Total	120 000

-DECEMPE AT CENTRES

	RECEIPTS A	T CE	TRES.	
	SATURDA	Y, FEB.	6.	
Omaba .	City	250	Hogs. 15,000 7,600 4,000	Sheep. 2,000 750
St. Loui	is	** ***	***	***
	MONDAY	, FEB.	8.	
Kansas Omaha	City	7,000	33,000 4,000 7,000	35,000 9,000 3,000
C. AJOU			* * *	***
	TUESDAY	FEB.	9.	
Chicago Kansas Omaha St. Loui	City	14,000	23,000 13,000 5,300	18,000 5,000 7,000
	WEDNESDA	Y, FEB	. 10.	
Kansas Omaha		9,000	48,000 10,000 7,800	30,000 4,000 5,500
St. Loui	is		***	
	THURSDA	Y FEB.	11.	
Kansas		,000 ,900	40,000 10,000 7,800	18,000 1,000 3,200

CHICAGO PROVISION MARKET RANGE OF PRICES.

8	SATURDAY, I	EB. 6, 19	004.	
	Open.	High.	Low.	Close.
LARD-(Per	100 lbs.)— 7.65	7.67%	7.55	7.57%
July	7.70	7.70	7.60	7.6214
RIBS-(Boxed	1 25c. more th	an loose)-	_	
	6.821/2		6.80	6.8214
PORK-(Per	6.97½	6.971/9	6.90	6.95
	13.65	19.75	19 8714	13.65
July	13.70	13.75		13.70
	MONDAY, FI	EB. 8. 190	4.	
LARD-(Per		,		
	7.65			7.52
	7.70			7.57
	d 25c. more th	an loose)-	-	
	6.85	7.02	6.80	6.82
PORK-(Per		******	0.02	0.00
	13.75	13.90	13.60	13.67
July				13.771/
	TUESDAY, F	EB. 9, 10	004.	
LARD-(Per				
July	7.57 7.65		7.57 7.65	7.77 7.87
	d 25c. more th		-	
	7.02	7.12 7.25	6.85 7.021/g	7.12 7.22
PORK-(Per	barrel)-			
May July	13.70	14.90 14.85	13.70 13.85	14.70 14.77
N	VEDNESDAY,	FEB. 10,	1904.	
LARD-(Per	100 lbs.)-			
May July	7.80 7.87 ½	7.821/6	7.70 7.80	7.70
RIBS-(Boxe	ed 25c. more t	han loose)	_	
May	7.15	7.25	7.10	7.15
	7.271/	7.30	7.25	7.271/
PORK—(Per	14.90	14.00	14.63	14 78
	14.85		14.77%	
	THURSDA			
PORK-(P	er barrel)-			
July	.14.79 14 .14.77 14	1.82 1	4.42 4.55	14.82 14.77
LARD-(P	er 100 lbs.)-	-	2.00	
May	er 100 lbs.)- . 7.70 . 7.77	7.75	7.65	7.72
RIBS—(Bo	exed 25c. mor	e than le	oose)—	
May	xed 25c. mor	7.17	7.05	7.12
outy	** ****	1.00	0 . 3. 6	7.25

DAVIES WARE-HOUSE & SUPPLY CO.

Office: 20 N. Clark St. on C. & N. W. R. R. CHICAGO
Warehouse: 161 N. Water St.

Tools, Scoops & Shovels.

Manufacturers and Dealers in all kinds of Packing House Supplies.

ALL IRON TANK COCKS, D&D Pattern XXX HAM and LIVER NEEDLES

XXX BRASS and IRON GOODS.

SOME RECENT PATENTS.

744,150. SOAP FRAMES.—Henry D. Winton, Wellesley Hills, Mass., assignor to Hersey Mfg. Co., South Boston, Mass.

Combination with a base comprising a plate and bars secured to the under side of the plate, of frames attached to the base at opposite sides, being secured thereto near their ends at points considerably separated, and axle bars connecting the frames.

746,984. APPARATUS FOR MANUFAC-TURING SOAP. — Alfred Flagendorf, Pittsburg, Pa.

Describes an apparatus in which all the stages of soapmaking, pressing and cutting are performed automatically, without transferring the material. It does not seem as if this scheme could be made a success on a large scale. It contains arrangement for cooling, pressing and cutting the soap.

747,108. APPARATUS FOR EXTRACT-ING GREASE.—Scott L. Holff, Philadelphia, Pa.

A closed casing for containing liquid solvent, with a drum mounted so as to rotate in said casing and an internal driving device for the drum, located in the upper portion of the casing above the axis of the drum, whereby it is above the level of the liquid solvent contained therein. This apparatus has some very good features.

747,311. EDIBLE FAT AND PROCESS OF MAKING SAME.—Neander N. Crossholm, Chicago, Ill.

The fat produced by this process will get rancid so easily and quickly that it hardly will be a commercial success. This fat consists of a mixture of a foamlike mass of albumen and an oleaginous body, the oleaginous body predominating, intimately commingled, while the oleaginous body is in a melted condition.

747,303. RENDERING TANK.—Eugene R. Edson and Benjamin J. Silliman, Cleveland, O., assignors to the Edson Reduction Machinery Co., Augusta, Me.

A rendering or reducing tank or receptacle comprising an interiorly chambered upright cylinder composed of annular cylinder-sections arranged in line vertically and forming a chamber wherein organic material is to be rendered or reduced, which sections are each provided with a heating-chamber arranged externally of the aforesaid material-receiving chamber; a head instrumental in closing the upper end of the material-receiving chamber and removably secured to the upper cylinder-section; a duct or outlet communicating with the lower end of the material-receiving chamber and having its mouth formed by a shell removably secured to the lower cylinder-section; an upright interiorly chambered heating-drum arranged within and centrally of the aforesaid material-receiving chamber; an upper pipe and a lower pipe in communication with the upper portion and lower portion respectively of the interior chamber of the heating-drum and in communication also with the heating-chamber of and removably attached to the upper cylinder-section and lower cylinder-section respectively, and the upper pipe being arranged a distance from the upper end of the upper cylinder-section equal to the distance which the lower pipe is arranged from the lower end of the lower cylinder-sec747,645. APPARATUS FOR EVAPORAT-ING BRINE. — Otto Sachse, Luneburg, Germany.

The combination with a cylindrical mantle with openings for carrying off the salt and vapors, with means for the formation of a vacuum, further openings in the mantle for the carrying off of salt and the admission of brine, annular trays, with hollow spaces between, connections between the hollow spaces, means for connecting the spaces between the trays with a steam conduit and for letting off the water formed in these spaces in the condensation process, of a rotating shaft passing through the central openings of the trays, the shaft being provided with stirring devices adapted to brush all surfaces covered by the brine.

747,787. DRYING MACHINE.—Ernst G. Smith, Columbia, Pa.

A drying chamber having feed and exit openings, a pair of spaced steam-pipes, disposed within the chamber, a circular carrying ring partly within and partly outside of the casing and disposed in a path between the rows of steam-pipes.

748,414. FILLING OR EMPTYING AP-PARATUS FOR VACUUM-DRIERS. — Emil Passburg, Berlin, Germany.

An excellent device for vacuum driers consisting of a pair of closing rigs, an intermediate chamber between these closing-devices, and an air-sucking device connected with this chamber.

748,857. FILTER.—Richard T. Gode, Allentown. Pa.

A granular-bed filter, a filtering chamber divided into an upper and a lower compartment, an axial shaft carrying agitators mounted in each compartment, means for rotating one of the shafts, and a ratchet connection between the shafts.

748,866. METHOD OF MAKING GLUE FROM HIDES.--Edward R. Hewitt, Garden City, N. Y.

This invention is using sulphurous acid for the extraction of the glue from hides. Experiments along similar lines were made previously. They proved that glue made by means of sulphurous acid is very light in color, but it is exceedingly difficult to get a clear product. Furthermore, all the glues extracted with sulphurous acid are much weaker than the glues made by the old process out of the same raw material.

This invention consists in hydrating the hides by means of an aqueous solution of sulphurous acid, which contains calcium phosphate and calcium sulphite, and then washing the hides to remove the excess of acid, dissolving the hides in hot water and then neutralizing the solution.

749,322. PROCESS OF TREATING OILS.

—Frederick B. Pope, Augusta, Me., assignor of one-half to Magnus Swenson, Chicago, Ill., and Lamar L. Fleming, New York.

This process is applicable to cottonseed oil. Consists in heating the oil to a high temperature immediately after it leaves the press, and while it is at an elevated temperature separating it in a continuous manner from the impurities.

750,051. DRIER.—Chas. E. Geiger, Louisville, Kv.

Combination with the cylinder, a manifold at the discharge end provided with an aperture about its axis; a chamber into which the aperture leads; a steam-pipe discharging through said chamber and said aperture into the manifold, said chamber comprising a cavity for accumulating water of condensation which extends lower than the lower margin of the aperture; a valve which controls discharge of the water of condensation from such cavity, and a float operatively connected with such valve.

749,828. DRYING MACHINE.—Franz Wertenbruch, Nottingham, England.

The combination of a trough in sections, a steam-passage under such sections, connecting-pipes between the ends of such passages, long longitudinal drying-tubes, and short longitudinal drying-tubes inside the drying-trough, ribs on the said tubes, shovels fixed to the outer ribs of the outer tubes, plates carrying the said tubes, revolving beaters, a steam-supply to the said tubes and a hot-air-supply pipe between the outer casing and the inside of the trough.

749,925. PROCESS OF REFINING OIL.— John C. Fleming, New York, N. Y.

Consists in mixing a solution of borax with the oil, mingling carbon dioxide with the mass, subjecting the mixture to an astonishing action, and finally permitting it to settle, thereby separating the objectionable elements. 750,235. FILTER TABLET.—William G.

Tousey, Somerville, Mass.

This filter-tablet is composed of a plurality of layers of fibrous material having aluminum hydroxid and pulverized charcoal between them.

TANNING MATERIALS AND EXTRACTS.

In determining the weight-giving and leather-forming properties of tanning materials and tanning extracts, ten grams of pure dry hide-powder, free from cellulose, are drummed in a churn of about 2 liters' capacity with 150 c. c. of distilled water for about half an hour. A liquor of the material under examination is made up, containing about 8 per cent. of tannin, and is diluted so that when 350 c. c. are diluted by the 150 c. c. of water in the churn the total amount of tannin in the churn will be exactly 5 per cent. This liquor (350 c, c,) is added 50 c, c, at a time, and the churn revolved for 30 minutes after each addition, and for one hour after the whole has been introduced. The tanned hide powder is placed on a filter funnel plugged with cotton wool, using the filtrate for washing purposes, is pressed down tightly and allowed to drip for 24 hours, and then weighed. A portion (10 grams) is dried to determine the moisture, and from the dry weight the amount of combined and uncom bined tannin in the whole is calculated. Another portion (20 grams) is placed on a plugged filter as before and washed with one liter of water. When dried, the amount of chemically and physically combined tannin is calculated. The yield of washed leather and of unwashed leather thus gives respectively the strictly combined tannin and the combined plus uncombined tannin. Estimation of the hide substance in the washed and unwashed leather confirm these weight results to the second decimal place.

SILENT CUTTER AND ELECTRIC MOTOR.

The well-known firm of John E. Smith's Sons Co., of Buffalo, N. Y., are now building their improved Buffalo Silent Meat Cutters with electric motors attached on one base. Where room is an object this is quite a convenience. For further particulars it will be well to write to John E. Smith's Sons Co.

MARKET	PRICES.	VINEGAR PICKLE—COOKED MEATS.
CHICAGO.	EXTRACT OF BEEF.	Pig's Feet, ½ bbl. 80 fb. \$8.00 Snoutz, ½ bbl. 80 fb. 5.20 Ox Hearts, ½ bbl. 80 fb. 5.30 Plain Tripe, ½ bbl. 80 fb. 2.40 H. G. Tripe, ½ bbl. 80 fb. 4.55
FERTILIZERS.	l oz. jars i dozen in bax. Per doz.	1. 0. 111pc, 7 mu. or so 1.00
	1 oz. jars 1 dozen in box	DRESSED BEEF.
ried blood, per unit	8 oz. fars 4 dozen in hox	DRESSED BEEF.
oof meal, per unit. 4 2.20 oof meal, per unit. 4 2.20 oncent. tank, 15 to 105 per unit. 6 2.15 round tank, 10 to 115 per unit. 2.25 6 10c. nground tank, 10 to 115 per unit. 2.10 6 10c.	6 oz. jars 1/4 dozen in box	Carcass. Fores, Hinds
round tank, 10 to 11s per unit	and a set of the set o	Fair Yows. 614 5 14 15 15 15 15 15 15 15 15 15 15 15 15 15
nground tank, 9 and 30%, ton	DADDELED DEEP AND DODE	Native Heifers
ound raw bone, per ton	BARRELED BEEF AND PORK.	Western Steers
ound steam bone, per ton18.00	Extra plate beef 39.50	Native Steers
i	Plate beef	
HORNS, HOOFS AND BONES.	Prime mess beef	BEEF CUTS.
	Rump butts	
orns, No. 1, 65 to 70 m, avg. ton\$275.00	Rump butts. 9.50 Mess pork, repacked. 14.00 Extra clear pork, Long Cut. 15.00	No. 1. No. 2. No. Loins
oofs, black, per ton		Short Loins 20 18 13 Ribs 14 1236 64
oots, white, per con		Tenderloins.
and Shin Bones, 50 to 52 b, avg. ton 40.00	DRIED BEEF PACKED.	Plates 414 414 312
ang ringh bones, so to so is, avg. tou so.oo	Ham sets	Rounds
	Insides 13a	
LARDS.	Outsides	Chucks, boneless
tules estmentages	Reg. clods	Strip Loins
noice prime steam @ 7.4214		Beef Ham Sets
rime steam	SMOKED MEATS PACKED.	
лирочич че о		BEEF SUNDRIES.
	A. C. Hams	Cheek meat 4
STEARINES.	Shoulders	Hanging Tenders. 69 Flank Steak. 700
an.c.	Breakfast Bacon	Flank Steak
leo 6%@ ard 67%		Shanks 34
ard		Flanks (rough)
rease, B	LARD.	Kidneys
	Done lead bettle our daniel our B. to	Sweetbreads25
OILS.	Pure leaf, kettle rendered, per B, tcs	Oxtalis
	Lard compound : 672	Hearts 3 Tongues 113
ard Oil, extra winter strained tes	Barrels %c. over tes. Half barrels %c. over tes. Tues, from 10 to 80 % %c. to ic. over tes.	Clean Tripe (reg.) 21
and Oil No 1 St	rues, from 10 to 80 B %c. to 1c. over tes.	Clean Tripe (H. C.)
ard Oll. No. 3		
Neo Oil No. 2 @ 7%	BUTTERINE.	CALVES.
ard Oii. No. 2. 34 lee Oil, extra. 7542 754 lee Oil, extra. 7542 754 lee Oil, extra. 6 75 lee Oil No. 2. 6 75 leatsfood Oil, pure 6 72 leatsfood Oil, pure 6 72 leatsfood Oil, No. 1 66	F. O. B. CHICAGO.	Carcass 7 @ 10
	No. 1. natural color @ 10	Fores 5 6 8 Hinds 9 6 12 Sweetbreads 45c,
TALLOW.	No. 2, natural color	Sweetbreads
	No. 4, natural color	Livers 30c.
ackers' prime	F. O. B. KANSAS CITY.	
0. 2	No. 1, natural color	MUTTON.
ity renderers 514@ 514	No. 3, natural color	Lambs (carcass)
	No. 4, material color	Ewes (carcass)
GREASE.		Ewes (catcass). 7 6 8 Yearlings (carcass) 9 6 10 Weshers (carcass) 8 0 9 Mutton (racks) 6 6 7
***	BOILED MEATS.	Mutton (racks) 6 @ 7
rown		Mutton, legs
White. A	Hams, boneless	Mutton stews
***************************************	Rolled shoulders 1034	Lamb, loins @ 16
OUDING MANDRAYS	DRY SALT MEATS.	Lamb, saddles
CURING MATERIALS.	DRI SALI MEAIS.	Lamb, tongue
defined saltpetre	Rib bellies @7.8716	pan
Borax	Short clears	DANK '
Pure, open kettle	Piates, regular	PORK.
White, clarified	Aucircui suouideis	Dressed Hogs 7
Plantation, granulated		Tenderiolns
ialt—	SAUSAGE CASINGS.	Spare Ribs 7
Ashton, in bags, 224 b	Boof would not of 100 fe	Butts
Michigan, medium, car lots, per ton3.00@3.50 Michigan, granulated, car lots, per ton2.65	Beef round, set of 100 ft	Shoulders (skinned) 6
Casing sait, bbis., 290 D., 2X and 3X 1.10	Beef bungs, each	Trimmings
	Hog bungs exports	Hearts (per pound)
COOPERAGE.	medium, eachsmall, eachsheep casings, per bundle	Heads (rough)
Tierces	Sheep casings, per bundle	Hocks
Barrels		Cheek Meat
	SAUSAGES.	Backfat 6
		Plux (per fb)
	Summer, H. C	Pigs' Feet (rough)
	German Salami	Prigs Freet (cleaned)
BUTCHERS' WHOLESALE PRICE	O'Arles H. C. 18 Italian Salami 18	Snouts and Ears
LIST.	Cervelat	
	Bologna 6	

CORNED, BOILED AND ROAST BEEF.

																						P	6	r	d	0	2
1	D.	2	dog.	to	CE	se		0.0								0		 						.1	n	. 3	ä
- 3	D.	1	or 2	do	Z.	to	e	M	P		0.1							 							2	.4	ė
			dog.																								
6	D.	1	dog	to	ca	use						 0				0.1		 							8	4	Ä
	m. !	14	dog.	to	CI	ise			6.8	*			*	 	. 6		*			6				.1	×		ä

Summer, H. C 10	
German Salami 13	1
Holsteiner 11	
D'Arles H. C	
Italian Salami 18	į.
Cervelat	
Bologna	
Frankfurts 7	3
Blood, Liver and Head Cheese	
Tongue	
Special Compressed Ham 8	1
Berliner Ham 8	ļ
Polish 7	1
Veal Ham 7	
Pork Sausage 734@8	ķ.

Pig's Feet, 1/4 bbl. 80 1	١						0	0	0	9 4			01	 					.8	8.00
Snouts, 16 bbl. 80 1b					٠											0	0			5.20
Ox Hearts, 1/9 bbl 80	D										0				,	9			. !	5.30
Plain Tripe, 14 bbl., 80	Ib		0.0			۰		0 1	0 0			9 1				0			. :	2,40
H. C. Tripe, 14 bbl., 8	H	١.			•												0		. 4	1.50

Fair lows	Carcass.	Fores.	Hinds .
Good Young Cows	7	536	136
Native Heifers Texas Steers	7 (0)7%	536	934
Western Steers	714@8	619	10

No. 1. Loins	No. 2. 1236 18 1246	No. 9 12 616
Tenderloins	516 416 7	16 4)6 3)6 6
Shoulder flods, boneless	616	6@ 7 5
Strip Loins Beef Ham Sets	**	8

Cheek 1	meat																													. 4
Hangin	g Te	nde	er	3.	* 1		0.1																							. (
Flank	dteak											٠.																	1	Tal
rimmi	ngs.																													. 4
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Carcass.							 									 . 7	60	10	
Fores	 	 		 							 					 . 5	0	8	
Hinds																	0	12	
Sweethr																	-	-	
Livers																30			

Lambs (carcass)		1116@ 1246
		7 @ 8
Yearlings (carcass)		9 (2 10
Wethers (carcass)		8 @ 9
Mutton (racks)		6 @ 7
Mutton, legs		@ 11
		@ 514
Mutton stews	***********************	@ 514
Lamb (racks)		9 @ 10
		@ 16
		@ 16
		Ø 16
		12c, per lb.
		5c. pair

Dressed Hogs												
Tenderioins	 	 			**	 *			٠	٠	٠	
Pork Loins	 	 	٠,					0 0				
Spare Ribs	 											
Butts	 		 *	 								
shoulders	 		 	 								
Shoulders (skinned)	 		 	 								ì
Frimmings												
Pigs' Tails												
Hearts (per pound)												
Leaf Lard												
Heads (rough)												
Heads (cleaned)												
Hocks												
Cheek Meat												
Neck Bones	 											
Backfat	 	 										
Plux (per fb)	 	 										
Kidneys (per 10)	 _											
Pigs' Feet (rough)												
Pigs' Feet (cleaned)												
Brains (per fb)												
Snouts and Ears	 	 					*	*	 			*

BUTCHERS' OFFAL.

Tallow		 	 		. 0						0 1	 	4c.
Mixed Bone and	Tallow	 	 		0 0							234	per to
Calfskins, 8 to 15	D					*		×	ĸ.			1014	@ 11
Calfakins, under	8 Th.	 	 				 	۰				60e	- each

NEW YORK CITY	Good to choice heifers	SPICES. Whole, Ground
TITE CLEATE	Choice cows	Pepper, Sing., white
LIVE CATTLE.	Good to choice oxen and stags	Pepper, Penang, white
WEEKLY RECEIPTS TO FEB. 8. Beeves. Cows. Calves. Sheep. Hogs.	Fleshy Bologna bulls	Pepper, snot
Jersey City 2,728 486 11,663 15,732		Cortander
Sixtleth street 410 50 1,410 7,927	DRESSED CALVES.	Mace
Fortieth street	Veals, city dressed, prime, per b	
Weehawken 785 800	Veals, good to choice, per m	SALTPETRE.
Scattering 902 60 60 28	Calves, country dressed, fair to good	Crude
Totals 9,849 110 1,965 20,418 42,284		Crystals 414 @ 514
Totals last week11,010 127 2,200 35,991 35,657	DRESSED HOGS.	Powdered 434 6 454
WEEKLY EXPORTS.	Pire 9 6 914	MUD OF UP 15 A PURE
Live Live Qrs. of cattle. sheep. beef.	Pigs	THE GLUE MARKET.
Schwarzschild & Sulzberger, Sa. Armenian	Hogs, 180 fb	A extra
Schwarzschild & Sulzberger, Ss.	Hogs, 140 D 73670 736	1
Marquette	DECCED CHEED AND LAND	1X
Philadelphia	DRESSED SHEEP AND LAMBS.	134 136
J. Shamberg & Son, Ss. Arme- nian	Spring Lambs, choiceper 10 1014 2 11 Spring Lambs, good	194 12 194 10
J. Shamberg & Son, Ss. Mar-	Spring Lambs, cuils. @ 10 Sheep, choice. @ 71/2	134
guette	squen, medium to good	2 , 9
Morris Beef Co., Ss. Armenian 2,850	Sheep, culls @ 6	*
Morris Beef Co., Ss. Cedric 1,800 Armour & Co., Ss. Armenian 1,350	PROVISIONS.	GREEN CALFSKINS.
Armour & Co., Ss. Armenian 1,350 Armour & Co., Ss. Philadelphia 2,000		No. 1 calfskinsper lb .14
W. W. Brauer Co., Ss. Norman Prince 75	(Jobbing Trade)	No. 1 calfskins, buttermilk
Prince	Smoked hams, 10 th average	No. 1 calfskins, 12-14each 1.50 No. 2 calfskins, buttermilk
L. S. Dillenback, Ss. Korona 25	Smoked hams, Heavy	No. 2 calfskins, 1214-14 bpiece 1 30 No. 1 grassersper b .12
A. E. Outerbridge & Co., Ss. Korona	California hams, smoked, light	No. 2 grassers per 7b .69 No. 1 heavy kips, 18 b and up plece 1.90 Toby keivy 16 b and up 160
	Smoked bacon, boneless @ 12 Smoked bacon (rfb in)	TICKY MIDS, IC IO MUU UD DIECE 1.40
Totals	Smoked beef tongues, per D @ 13	No. 2 heavy kips, 18 m and up
Total exports last week 3,008 2,445 13,100 Boston exports this week 1,725 808 9,695	Smoked shoulders	No. 1 grass kipspiece 1.50
Baltimore exports this week 1,551 905 1,898	19 0/2	No. 2 grass kips piece 1.25 Ticky kips piece 1.06 Branded beavy kips piece 1.10
Philadelphia exports this week 1,962 250 1,200	BONES, HOOFS, HAIR AND HORNS.	Branded kips
Portland exports this week 987 Newport News exports this week 1,476 750	Round ship bones, av. 50-60 % cut, per 100 hones.	Branded skinspiece .50
St. John exports this week 1,403 1,212	per 2,000 fb	
To London	2,000 lb	GAME.
To Glasgow	2,000 Tb 75.00	DRY-PACKED.
To Bristol 200	Hoofs	Snipe, English, per dozen
To Manchester		Grass, per dozen
To South Africa 75	BUTCHERS' SUNDRIES.	Ked Head, per pair
To Bermuda and West Indies 10 95	Fresh t'ow Tongues	Ruddy, per pair 1.00@1.25 Mallard, per pair 75@1.00 Teal, blue wing, per pair 50@ 60
Totals to all ports	Calves' head, scalded 30r to 40c a piece	Teal, green wing, per pair 40@ 50
Totals to all ports last week11,069 10,113 30,424	Sweet breads, veal	Rabbits—Prime cotton tails, per pair. 15@ 20
QUOTATIONS FOR BEEVES. Good to choice native steers\$5.00@\$5.40	Calves' liver	Small and inferior, per pair 10@ 12
Medium to fair native steers	Mutton kidneys Lie to 21c a piece	DRESSED BOULTRY
Oxen and stags 2.50@ 4.60	Livers, beef	DRESSED POULTRY.
Bulls and dry cows	Rolls, beef	DRY-PACKED. Turkeys—West'n, young hens, selected @19
	Lamba' fries 6c to 10c a pair	W'n. young toms, medium weights, selected
THE CALVES	Fresh pork loins, city	W'n, young toms, heavy weights @17 W'n. young hens & toms, selected. @18
LIVE CALVES.	OWNOVERDOL BANK	Western, mixed, fair to prime15 @17
Live veal calves, a few selected 160 th 7 % 8 8 Live veal calves, good to prime, 160 th 7 @ 8	BUTCHERS' FAT.	Old hens
	Ordinary shop fat	Broilers, Phila., 4 lb. and under to
LIVE HOGS.	Shop bones, per cwt	pair, fancy
Hogs heavy weights (per 100 lbs.) 5.50 @5.70	DIALIED CHEEDONING	Western dry ploked 4 lb and up.
Hogs, medium	PICKLED SHEEPSKINS.	Chicken-Phila., fcy., large, per lb19 @20
Pigs. 5.90 @5.96 Roughs 4.70 @4.80	XXX sheep, per dozen 6 \$5.75 XX sheep, per dozen 6 4.50 X sheep, per dozen 6 3.75	Phila., mixed sizes, per lb15 @18 State and Pa., fancy, per lb15 @16
Roughs w.r. w.r.	X shrep, per dozen	State and Pa., fancy, per lb
LIVE SHEEP AND LAMBS.	Sheep, ribby	Ohio & Mich., sc'ld'd. lrg., fcy15 @
Spring lambs, selectedper B 7%	Y muche per dozen @ 250	Western, dry-picked, large, per lb14 @14 1/4
Spring lambs, good to choiceper B	No. 2 lambs, per dozen	Western, scalded, large, per lb14 @14 1/2 Western, dry-picked and scalded,
Sheep, selectedper 10 / Ib. 4 1/2	Cills lambs @ 75	medium sizes
Sheep, medium to goodper 100 fb. 4 Sheep, cullsper 100 fb. 3	SAUSAGE CASINGS.	Western, inferior
		Squabs—Prime, large, white, per doz.4.25@4.50 Mixer, per doz
DRESSED BEEF.	Sheep, imp., wide, per bundle	Mixer, per doz
	Sheen into medium per bundle	Old cocks, per lb
CITY DRESSED.	Stierp, tillp, tier buntie, tierrow	
	Sheep imp., Russian Rings.	Western, large, fancy, per lb13 @14
Choice native, heavy	Sheep tmp., Russian Rings Hog, American, in tes, or bbls., per fb, F.O.S. 42 Hog, American, kegs, per fb, F. O. B. 42	Fowls and chickens, poor, per lb. 10 @12 Old cocks, per lb. 10 @10\square. Spring Ducks—Jersey. Pa. & Va. 15 @16 Western, large, fancy, per lb. 13 @14 Western inferior, per lb. 9 @11
Choice native, heavy 8¼ @ 9 Choice native, light 8 @ 8½ Common to fair, native 7 @ 8	Hog, American, Regs. Petr III, F. U. B	Western, large, fancy, per lb
Choice native, heavy	Hog, American, Regs, Per B. F. O. B	Spring chickens, nearby, per lb @1114
Choice native, heavy	Hog, American, Regs, Per D. F. O. B	LIVE POULTRY. Spring chickens, nearby, per lb
Choice native, heavy 814 @ 9	Hog, American, Regs, Per B. F. O. B	LIVE POULTRY. Spring chickens, nearby, per lb
Choice native, heavy	Hog, American, Regs, Per B. F. O. B. 12 Beef, rounds, per set, f. o. b. Chicago. 12 Beef, rounds, per set f. o. b. N. Y. 13 Beef, rounds, per fb. 2 Beef, ounzs, piece, f. o. b. N. Y. 8 Beef, bunzs, per b. 5 Beef, middles, per set, f. o. b. Chicago. 35 Beef, middles, per set, f. o. b. N. Y. 37 Beef, middles, per set, f. o. b. N. Y. 37 Beef, middles, per set, f. o. b. Chicago. 35 Beef, middles, per set, f. o. b. Y. 37 Beef, middles, per set, f. o. b. Chicago. 36 Beef weapands, per f. 1000, No. 1's. 36	LIVE POULTRY. Spring chickens, nearby, per lb
Choice native, heavy	Hog, American, Regs, Per B. F. O. B. 12 Beef, rounds, per set, f. o. b. Chicago. 12 Beef, rounds, per set f. o. b. N. Y. 13 Beef, rounds, per fb. 2 Beef, ounzs, piece, f. o. b. N. Y. 8 Beef, bunzs, per b. 5 Beef, middles, per set, f. o. b. Chicago. 35 Beef, middles, per set, f. o. b. N. Y. 37 Beef, middles, per set, f. o. b. N. Y. 37 Beef, middles, per set, f. o. b. Chicago. 35 Beef, middles, per set, f. o. b. Y. 37 Beef, middles, per set, f. o. b. Chicago. 36 Beef weapands, per f. 1000, No. 1's. 36	LIVE POULTRY. Spring chickens, nearby, per lb

FERTILIZER MARKETS.

BASIS, NEW YORK DELIV	ERY.		
Bone meal, steamed, per ton\$	22.00	@2	3.00
Bone meal, raw, per ton	95.00		5.50
Nitrate of soda—future	2.05		2.0734
Mittate of soda-ruture	2.15		2.25
Nitrate of soda-spot			
Bone black, spot, per ton13.50	.ch .	01	0 *** 1/9
Dried blood, N. Y., 12-13 per cent.		_	
ammonta	2.55	0	2.60
Dried blood, West, high grade, fine ground, c. f., N. Y			
ground, c. f., N. Y	2.75	@	2.90
Tankage, 9 and 20 p. c., f. o. b. Chi-		-	
cago	22,00	000	3.00
Tankage, 8 and 20 p. c., f. o. b., Chi-		-	10.00
	10.00	0	0.00
cago	18.00	W.	9.00
Tankage, 7 and 30 p. c., f. o. b. Chi-		1.	
cago	15.00	@1	6.00
Tankage, 6 and 35 p. c., f. o. b. Chi-			
cago	15.00	@1	6.00
Garbage tankage, f. o. b. New York.	8.00	a	9.00
Fish scrap, dried, 11 p. c. ammonia		-	
	29.00	00	0.00
	40.00	A .	10.00
Wet, acidulated, 6 p. c. ammonia,	** **	-	nd on
per ton	14.00		3.00
Azotine, per unit, del. New York	2.60	0	2.65
Sulphate ammonia gas, for shipment,			
per 100 lbs	3.20	0	3.25
Sulphate ammonia gas, per 100 lbs.,			
spot		0	3.20
Sulphate ammonia bone, per 100 lbs.	3.10	@	3.15
So, Carolina phosphate rock, ground,	0100	40	
per 2,000 lbs., f. o. b. Charleston	6.50	0	2 25
	0.00	AR.	1.10
So. Carolina phosphate rock, undried,	0.50	-	~ ~~
f. o. b. Ashley River, per 2,400 lbs.	3.50		
The same, dried			4.00
POTASHES, ACCORDING TO Q			
Kainit, shipment, per 2,400 lbs	. \$8.9	5 (@ 9.50
Kainit, ex-store, in bulk	9.00	@	10.65
Kieserit, future shipment	7.00	0	7.25
Muriate potash, 80 p. c., ex-store	1.88		1.95
Muriate potash, 80 p. c., future ship-	4 11/10	-	4.00
ment	1.80	40	1.00
	1.80	'an	1.80
Double manure sait (46@49 p. c., less			
than 21/2 p. c. chloride), to arrive,		_	
per lb. (basis 48 p. c.)	1.09	- G	1.12
Sulphate potash, to arrive (basis 90			
p. c.)	2.08	a	2,20
Sylvinit, 24 to 36 p. c., per unit.	-	-	
8. P	.39	a	.40
	3133	-	

OCEAN FREIGHT.

	Liverpool. Per Ton.	Glasgow. Per Ton.	Hamburg Per 100
Canned meats	12/6	15.	20c
Oil cake	7/	7/	12c
Bacon		15/	20c
Lard tierces	12/6	15/	20c
Cheese	20/	25/	2 M
Butter		30/	2 M
Tallow		15/	20e
Beef, per tierce	2.6	3/	20c
Pork, per bbl		2/0	20e

EXPORTS OF PROVISIONS

Exports of hog products from Atlantic ports for week ending Feb. 6, with comparative tables:

			Nov. 1.
	Week.	Week	1903, to
	Feb. 6.	Feb. 7	Feb. 6.
	1904.	1903.	1904.
United Kingdom	866	913	12,920
Continent	484		
Continent		491	5,795
So, and Cen Am	563	138	6,085
West Indies	948	919	17,316
Br. No. Am. Col	100	19	2,705
Other countries	10	11	1,271
Totals	2,971	2,491	46,092
BACON A	ND HAMS,	POUNDS:	
United Kingdom			
Continent			148,504,623
Continent	1,324,625	1,606,236	23,105,005
So. and Cen. Am	92,400	171,450	2,148,000
West Indies	164,775	201,875	8,721,325
Br. No. Am. Col Other countries	1,600	529,700	14,450 749,175
Totals	11,987,809	11,433,558	178,242,578
LA	RD, POUN	DS.	
United Kingdom	5,421,738	5,332,794	80,046,587
Continent	4.004,906	4,785,273	100,174,676
So, and Cen. Am	134,595	380,825	
West Indies	554,050	501,620	
Br. No. Am. Col			
Other countries	W 2740	5,500	85,080
Other countries	5,740	75,900	984,315
Totals	10,121,029	11,061,972	197,522,288
RECAPITULATI			PORTS.
		Bacon and	
Name Waste	Pork, bbls. I		Lard, lbs.
New York	2,073	5,664,050	0,188,520
New York Boston	2,073 100	5,664,050 1,200,075	6,188,520
New York Boston Portland, Me	2,073	5,664,050	0,188,520 802,250
New York Boston Portland, Me	2,073 100	5,664,050 1,200,075	0,188,520 802,250 495,860
New York Boston Portland, Me Philadelphia	2,073 160 4	5,664,050 1,200,075 2,360,100 306,000	6,188,526 802,256 495,866 1,501,826
New York Boston Portland, Me Philadelphia Baltimore	2,073 100 4 126	5,664,050 1,200,075 2,360,100 306,000 481,909	6,188,520 802,250 495,860 1,501,826 350,698
New York Boston Portland, Me Philadelphia	2,073 160 4	5,664,050 1,200,075 2,360,100 306,000	0,188,520 802,250 495,860 1,501,826 350,698 243,875
New York Boston Portland, Me Philadelphia Baltimore New Orleans	2,073 100 4 126 143	5,664,050 1,200,075 2,360,100 306,000 481,909 106,000	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000
New York Boston Portland, Me. Philadelphia Baltimore New Orleans St. John, N. B. Totals.	2,073 100 4 126 143 525	5,664,050 1,200,075 2,360,100 306,000 481,900 1,66,000 1,869,075	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000
New York Boston Portland, Me. Philadelphia Baltimore New Orleans St. John, N. B. COMPAI	2,073 100 4 126 143 523 2,971 RATIVE SU	5,664,050 1,200,075 2,360,100 306,000 481,900 1,869,075 11,987,809 MMARY,	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000
New York Boston Portland, Me. Philadelphia Baltimore New Orleans St. John, N. B. COMPAI	2,073 100 4 126 143 523 2,971 RATIVE SU	5,664,050 1,200,075 2,360,100 306,000 481,900 1,869,075 11,987,809 MMARY,	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000
New York. Boaton Portland, Me Portland, Me Philadelphia Baltimore New Orleans. St. John, N. B Totals.	2,073 160 4 126 143 523 2,971 RATIVE SU Nov. 1,	5,664,050 1,200,075 2,360,100 306,000 481,900 106,000 1,869,075 11,987,809 MMARY, Nov. 1, 1902,	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000
New York Boston Portland, Me. Philadelphia Baltimore New Orleans St. John, N. B. COMPAI	2,073 100 4 126 143 525 2,971 BATIVE SU Nov. 1, 1903, Feb. 6, to	5,664,050 1,200,075 2,360,100 306,000 481,909 1,869,075 11,987,809 MMARY. Nov. 1, 1902, Feb. 7,	0,188,520 802,250 495,800 1,501,826 350,696 243,875 538,000
New York Boston Portland, Me Portland, Me Philadelphia Baltimore New Orleans. St. John, N. B COMPAI	2,073 100 4 126 143 525 2,971 BATIVE SU Vov. 1, 1903, Feb. 6, to	5,664,050 1,200,075 2,360,100 396,000 481,900 1,869,075 11,987,809 MMARY. Nov. 1, 1902, Feb. 7, 1903.	0.188,520 802,230 495,800 1,501,829 350,698 243,875 538,000 10,121,029
New York Boston Portland, Me. Philadelphia Balitimore New Orleans St. John, N. B. COMPAI COMPAI Pork, ibs.	2,073 160 4 126 143 525 2,971 RATIVE SU Nov. 1, 1903, Feb. 6, to 1904. 9,218,400	5,664,050 1,209,075 2,360,100 306,000 481,909 106,000 1,869,075 11,987,809 MMARY, Nov. 1, 1902, Feb. 7, 1903, 8,770,807	0.188,520 802,230 495,800 1,501,829 350,698 243,875 538,000 10,121,029
New York Boston Portland, Me Portland, Me Philadelphia Baltimore New Orleans. St. John, N. B COMPAI	2,073 160 4 126 143 523 2,971 RATIVE SU Nov. 1, 1908, 1904, 9,218,400 173,242,578	5,664,050 1,200,075 2,360,100 396,000 481,909 106,000 1,869,075 11,987,809 MMARY. Nov. 1, 1902, Feb. 7, 1993, 8,770,807	6,188,520 802,250 495,860 1,501,826 350,698 243,875 538,000

LARD IN NEW YORK.

Western steam, \$7.85; city steam, \$7@7.25; refined, continent, tcs., \$8; do., South America, tes., \$8.50; do., kegs, \$9.50; compound, \$6.75

HOG MARKETS FEBRUARY 11.

CHICAGO.—Receipts, 40,000; slow; steady; \$4.85@5.45

KANSAS CITY.-Receipts, 10,000; \$4.85@ 5.20.

OMAHA.—Receipts, 8,000; steady to easy; \$4.65@5.15

ST. LOUIS.-About steady; \$4.60@5.35. INDIANAPOLIS .- Receipts, 7,000; higher;

CLEVELAND.—Receipts, 35 cars; active; about steady; \$5.55@5,60.

EAST BUFFALO .- Receipts, 20 cars; 15@ 20c. higher; \$5.70@5.85.

LIVERPOOL.

Liverpool, Feb. 11.-Beef.-Extra mess, 66s. 3d. Pork, prime mess, Western, 66s. 3d. Hams-Sugar cured, 44s.; short ribs, 36s.; long clear middles, light, 37s. 6d.; long middles, heavy, 37s.; short clear, 36s. 6d.; clear bellies, 43s. 6d.; shoulders, square, 11 to 13 lbs., 34s. Lard-Prime Western, in tes., 38s. 3d.; American refined, in pails, 38s. Cheese-American, finest colored, 53s. Tallow-Prime city, 25s. Turpentine, 47s. Cottonseed oil (Hull), 19s. 9d. Rosin, common, 7s. 101/2d. Linseed oil (London), 17s. 101/2d. Refined petroleum, 7 11-16d.

OLEO AND NEUTRAL LARD.

Rotterdam, Jan. 23.—Oleo Oil, seems slight-Total sales about 1.640 tcs. ly weaker. American oleo and stock against about 2,000 tes. during same period 1903 and against about 3,343 tcs. last week. Arrivals-1,179 tes. Total arrival from America, 1903, 4,287 tes. Present stocks American oleo and stock about 5,173 tes. oleo and stock against about 7,451 tcs. same time last year.

Neutral Lard-Market still very quiet: strictly choice brands are being offered on shipment at fl. 51/491/4 and Backfat Neutral lard at fl. 461/2/451/2.

Cottonseed Oil-Market practically unchanged, the quotations being the same as last week's. Arrivals this week about 9,943 bbls. American cottonseed oil.

Linseed Cake.-On the whole slightly firmer owing to the colder weather. S. K. brand sold at fl. 74, February; fl. 731/2, March shipment. Prime western offered spot fl. 72, January, April shipment, fl. 71/701/2.

CATTLE SLAUGHTERED.

Special reports to The National Provisioner show the number of cattle slaughtered at the following centres for the week ending February 6:

Chicago	 25,323
Omaha	9,405
Kansas City	 11,535
St. Joseph	8,708
Cudahy	 460
Sioux City	 1,196
Wichita	 325
Cincinnati	 3,605
Louisville	 1,225
Detroit	 891
Denver	 640

SHEEP SLAUGHTERED.

Special reports to The National Provisioner show the number of sheep slaughtered at the following centres for the week ending February 6:

Chicago					 		 		 	,					0				0	66,133
Omaha	0															0	9			22,193
Kansas	0	'n	t	y										۰						13,696
St. Jose	p	h								,	,	. ,								13,600
Cudahy	٠,							 				٠								200
Wichita																				25
Cincinna																				979
Detroit															٠					2,425
Denver	_																			1.502

HOGS SLAUGHTERED.

Special reports to The National Provisioner show the number of hogs slaughtered at the following centres for the week ending February 6:

Chicago		118,921
Omaha '		
Kansas City		
St. Joseph		33,948
		13,364
Sioux City		11,630
Ottumwa		13,650
Cleveland		16,250
Cedar Rapids		12,152
Wichita		7,119
Nebraska City		6,866
Bloomington		2,014
Cincinnati	* * * * * * * * * * * * * * * * * * * *	13,780
Indianapolis		21,566
Louisville		6,900
Detroit		2,949
Denver		2,346

CHEMICALS AND SOAPMAKERS' SUP-PLIES.

74% Caustic Soda at \$1.80 to \$1.85 for 60%.
76% Caustic Soda at \$1.85 to \$1.90 for 60%.
60% Caustic Soda at 2 cts. per lb.
98% Powdered Caustic Soda at 3 cts. per lb.
58% Pure Alkali at 90c. to 1c. for 48%.
48% Carbonate Soda Ash at \$1.10 per 100 lbs.
Borax at 8 cts. per lb.
Talc at 2½ cts. per lb.
Pelm Oil in casks 6½ cts. lb., and in barrels 6% ts. lb.



E. A. BRYAN CO. STEEL TANKS

.. OF EVERY DESCRIPTION ..

Structural iron work, all kinds of heavy and light plate work, Gray Iron Castings and all kinds of Machinery Work

Chicago Office: 414 First Mational Bank Building. Works: HARVEY, ILL.

RETAIL DEPARTMENT

A BONUS SCHEME WARNING.

Retailers in the meat and provision trades in several western towns, particularly butchers, are being asked to subscribe for stock in one or another of the bonus packing plant schemes which are just now in their epidemic Very plausible arguments are advanced, supported by ingeniously arranged columns of figures, to prove to the butchers that there is a small fortune for them in this co-operative packinghouse plan. It is a case of history repeating itself. People have been bitten and will continue to be "nipped" in such schemes just as long as the "get-richquick" desire remains a phase of human nature. The industrial shares are strewn with the wrecks of such co-operative and bonus concerns. Here is a sample illustration in another branch of trade, showing that the type of schemer is ubiquitous. The Newburgh, N. Y., "News" says:

"A year ago last summer a number of Peekskill men were induced to subscribe heavily for stock in the Medicura Soap Company upon representation by the promoters that they would erect a large factory in the village and provide employment for hundreds of men and girls. The Peekskill papers said that Medicura soap would be the making of the town and prominent citizens, who investigated the proposition so far, as they could, talked up the industry for all they were worth. The Peekskill men parted with their spare cash, receiving therefor a miscellaneous assortment of common and preferred stock. Eighteen months have now passed, and there is no sign that the promoters of the company ever intend to manufacture Medicura soap or anything else in Peeks-

"The Peekskill 'News' says: 'We have talked with a number of those who invested in the stock of the Medicura Soap Company, and almost without exception they have hard words to say concerning the present state of affairs. They declare that the entire thing was a fake from the start and the promise to erect a factory in Peekskill was only bait to lead investors to put their money into the scheme.'

"Peekskill has learned a lesson that many other towns through the country have learned. A Western town of about the same population as Newburgh three years ago started out with a great hurrah to build up its industries. Promoters of a seamless tube concern, alleged to have been independent of the steel trust, came along and offered to locate a mill in the town that would employ a thousand skilled workmen if citizens would subscribe for \$100,000 worth of stock. They took the stock and the company went so far as to erect a cheap building or two and make a pretense at getting ready to operate. Within a year the doors and windows of the buildings were nailed shut, the company went into the hands of a receiver and the local stockholders have some experience as the sole return for their investment."

A SCHOOL FOR CLERKS.

Some of the large department stores in the East, notably John Wanamaker's in New York and Philadelphia, Marshall Field's, Chicago, and many others, have within the past few years established regular organized schools in which young men and young women are taught how to sell goods. Every storekeeper should hold meetings to instruct his clerks, says the N. C. R. Journal. Some of the things to be taught them are:

A knowledge of the various articles carried in stock.

Articles on which most profit is made.

How to show goods to the customer.

How to tie up packages neatly. How to dress windows.

How to handle transactions with customers. How to keep the store and windows clean.

How to increase sales.

How to decrease expenses.

A study of these things would improve your clerks and increase their interest in your business. A well trained clerk, who knows what to say to a customer and how to say it, can often sell a dollars' worth of goods to a man who comes in to invest a dime.

At sessions of the school, ask for criticisms and suggestions, and encourage discussion of them. Don't hide your troubles, but talk them over with your clerks for their education and advice. Such a school would increase the profits of your store and relieve you of worry and care. You need not give much time to it. Take an hour on a dull day every now and then, or an evening each week.

CARELESS CHARGES DO HARM.

The charge of Hon. James Wilson, secretary of agriculture, that retail butchers are responsible for the high beef prices and are "absorbing the large profits," is not only unjust, but untrue," says the Butchers' Gazette. If the honorable gentleman will take the trouble to visit the center market at Washington, D. C., he will find that the retailers are sometimes unable to cut enough money out of a side of beef to buy another. A little honest investigation of this matter will show Mr. Wilson that his statements are not only erroneous, but injurious to the interest of retail butchiers, inasmuch as they breed public discontent.

KNEW HOW IT WAS DONE.

A sergeant in a British regiment being obliged to submit to the amputation of his hand, the surgeon offered to administer chloroform as usual, but the veteran refused, saying: "If the cutting is to be done on me, I want to see it," and, laying his arm on the table, submitted to the operation without a sign of pain except a firmer setting of the teeth as the saw struck the marrow. The operator, as he finished, looked at his victim with admiration and remarked: "You ought to have been a surgeon, my man." "I was the next thing to one before I enlisted," said the hero, who was complacently examining the stump of his arm. "Ah, indeed; what was that?" said the surgeon. "A butcher!" was the sergeant's ans-

LOCAL AND PERSONAL

Nelson Mosher will open a new market at Warner, N. Y.

Samuel Bane has closed his shop at Kennett Square, Pa.

J. M. Burnett has opened the Union market at Tampa, Fla.

A. M. Debow has retired from the meat business in Topeka, Kan.

Fire destroyed the market of E. Aosta, at Fairfax, S. D., last week.

Bloom's shop at Leavenworth, Wash., was destroyed by fire last week.

C. E. Day, of Deerfield, Mass., will remove his meat business to Orange.

George Moore has purchased the shop of Lehman Bros., at Kenton, O.

Fire destroyed the market of Max Heller, Forest City, Pa., last week.

Charles Aikens will open a new market on North Main street, Findlay, O.

Henry Howey has sold his market at Willimantic, Conn., to Arthur J. Hanna.

E. B. Lutz, Reading, Pa., will shortly occupy his new shop at 319 Penn street.

J. F. Donnelly has opened a new market at Grant and Oneida avenues, Utica, N. Y.

The market of Damon & McCutcheon, Dallas, Tex., was destroyed by fire last week.

Hoffman, Meuser & Schaffner are building a new market on Holland street, Erie, Pa.

E. J. Jeffries, of Okeana, O., has bought the shop of A. R. Roberson, at Shandon, O.

W. F. Geale is building and will occupy a handsome new market at Asbury Park, N. J.

J. M. Flogan's market, 1564 Western avenue, Toledo, O., was destroyed by fire last week.

E. D. Browning has purchased the City Market at Edina, Mo., of George Allensworth.

A new market will be opened at Wylam, Ala., by the Tennessee Coal, Iron & Railroad Co.

Ground has been broken for the new Armour plant at Amsterdam, N. Y., to cost \$25,000.

F. J. Young has purchased the market of Salisbury Bros. at No. 83 South street, Utica, N. Y. S. W. Coe has closed his store at West Brookfield, Mass., and opened a new market at Westfield.

Sixteen farmers near Ben Clare, S. D., have started a co-operative meat market in that town, limiting its supply to animals of their own killing.

The Columbus, O., butchers' association has protested against the regulation which closes the city market at 9 a. m. They want the market to continue until noon.

F. Braasted & Co., Ipsheming, Mich., moved into their new market last week just in time. The day after their departure the old store caught fire and was destroyed.

There is a movement for a new public market at Niagara Falls, N. Y. The Central Market Company has offered to build a market for the city on Main street.

The Knapp Dressed Beef Co. has been formed at Sandusky, O., by George Knapp and his sons, who have run the People's market. They will embark in wholesaling on an extensive scale, in addition to the retail business.

The strike of the butchers' union at Los Angeles, Cal., which has been in progress since October 20 last, was declared off last week, the men being allowed to return to work as before. Wage questions and other differences were left to arbitration.

The city veterinarian of Minneapolis has recommended the establishment of a municipal abattoir, to avoid trouble with small slaughterers and uninspected killings. At present, he says, the big packers are the only killers observing proper methods and having adequate inspection.

The butchers of Savannah, Ga., who have not been organized, have been forced to get together to protect themselves from hucksters and peddlers who were hurting their trade. They have asked the city government to enforce market regulations. They claim Confederate veterans who get the huckster permits, because of that fact are in the habit of selling these permits to farmers and others.

AMONG THE ASSOCIATIONS.

The retail butchers of Duluth, Minn., have revived their old association and will inaugurate a campaign against hucksters and meat peddlers. They deny they are in a combination to control the price of meats.

The butchers' union of Spokane, Wash., is undergoing a reorganization, and has applied for a charter under the Amalgamated Meat Cutters of America. Only a part of the butchers of Spokane are in the union.

The Rochester Hide, Skin & Fat Association has elected the following officers: President, Benjamin Haag; secretary, F. J. Blaesi; treasurer, J. F. Vocht; directors, H. W. Hewer, D. A. Sampson, C. Erdle, W. C. Cook, F. E. Kramer, C. E. Hughes and the officers.

The Cincinnati Butchers' Club has elected the following officers: President, M. F. Hoffman; first vice-president, Clarence Meyer; second vice-president, Wm. Gerringer; secretary, Louis Kahn: treasurer, Chris. Ehrhardt.

The Butchers' Association at Pueblo, Colo., has decided to abandon the proposed plan for a cold storage plant to cost \$200,000. The money for the erection of the plant had been offered by outside capitalists, but it was decided not to undertake the scheme.

The United Butchers' Building Association has been incorporated at Baltimore, Md., by Joseph F. Snyder, Charles T. Kriel, George Plirt, Howard F. Greasley, George Ruppersberger, Charles Bertram, John Wasmith, Charles Peppler and Nimrod M. Crooks. Capital stock, \$130,000.

The Butchers' Retail Protective Association of Waterbury, Conn., has chosen these officers for the present year: President, William Riether; first vice-president, M. J. Cheney; second vice-president, Daniel Foley; treasurer, Charles Rogers; financial secretary, Thomas Gray; recording secretary, James H. Courtney; trustees, Albert Bley, Daniel McGrath and John McCarthy; sergeant-at-arms, James Gallagher.

A WASHINGTON SUNDAY LAW.

The new Sunday closing bill for Washington, D. C., has been introduced in the House by Representative Wadsworth, New York. The measure provides that it shall be unlawful for any person in the District of Columbia to sell or to offer for sale, or to keep open any place of business for the sale or delivery of any groceries, fruits, meats, vegetables or other provisions on Sunday, except that from June 1 to October 1 meats sold prior to Sunday may be delivered at any time before 10 o'clock of the morning of that day. Any person violating any of the provisions of the law is punishable by a fine of not less than \$25 nor more than \$50 for the first offense, and for each subsequent offence shall be fined not less than \$50 or more than \$100, or by imprisonment in the District jail not less than one month nor more than three months, or both, in the discretion of the

HIGHER STANDARDS OF MORALITY.

"There still are manufacturers who pack short count pickles, mackerel barrels and reputed pints and quarts of liquid wares; there still are jobbers who change the weight marks on barrels and cases, and there still are retailers who give short weight and measure," says the Merchants' "Review," "trusting to cover up their tracks by the use of heavy paper or the wetting of butter boxes in order to make them weigh double their usual weight; but, nevertheless and notwithstanding, there has been a long stride towards higher standards of business morals during the past thirty years, and the short measure and light weight frauds of the present day are less fraudulent in nature than they sometimes appear, being instigated principally by a desire to seem to be underselling a rival in business. They are like most of the adulteration frauds of the present day, the children of the rage for cheapness. The excuse is weak, however, and it is best for all parties concerned that all fraud and appearance of fraud in trade shall be stamped out."

PLAIN HINTS FOR DEALERS.

Everything connected with your business is an advertisement. The color and appearance of the exterior of your store, the condi-

tion of your sidewalk in front of it, the cleanliness and order of the interior-all of these things impress people to your advantage or disadvantage, says John H. Patterson. The style of your wagons and harness, the condition of your horses and the conduct of your drivers advertise you away from your store, while the manners of your clerks, their courtesy or lack of courtesy to customers, their appearance and dress, advertise you inside your doors. Your reputation for integrity, for promptness in paying your bills, your credit at the bank and with the houses from whom you buy-all of these things become known and advertise you for good or bad. Even your personal habits are included in this list.

An incident in my own experience proves the last statement. Last spring our company applied for a loan to be used in extending the business, which had doubled inside of three years. The banking house to whom we applied inquired first about our ability to repay the loan, and next concerning the character of the management of the business. Inquiry was made as to the moral character and habits of the men who control, whether they bet on horse races, gambled or drank to excess.

The two great necessities for business success are honesty and ability. Many a great business firm owes its success to the personal reputation of its managers. The reputation of a business man is his most priceless possession. It takes years to build up a business prestige, and its value is greater than that of any other advertisement.

No storekeeper can advertise his business successfully by merely inserting advertisements in the newspapers or sending out bills and pamphlets. Advertisements at best are nothing but statements of what a business man has to offer, and the amount of credit that is given to these statements will depend upon the reputation of the firm that makes them.

CHARACTER AS BUSINESS CAPITAL.

"Conscience makes character, character makes confidence, confidence makes credit, credit makes business, and business makes the world," said a minister in a recent "busiress sermon," preached to a gathering of the trade.

Character in business is, therefore, not a mere sentiment, but it is business capital, which, if rightly invested, will yield the largest returns of any investment that one can possibly make. Character lies at the foundation of all individual and business success. It is the basic principle that underlies the social and the business world, and is the one thing that determines a man's value to society and the work in which he is engaged.

Of course, a man's physical and intellectual strength is to be considered, but that, after all, can be estimated only at the price of old bones and gristle and the elements composing them, valuable or invaluable as they may be! Rene Bach, a scientist of some repute, says that the average man is composed of 96 pounds of sugar, three pounds of albumen. It ounces of calcium, three and one-half ownces of brimstone, and—a pinch of salt! This surely would not bring much in the "open market," but, to give the poor fellow his due, we are still compelled to say that, according to the same scientist, he has also in him a foot cube of carbon or diamond in the rough (mostly rough) and represents a total approximate cash value of \$18,300!

